

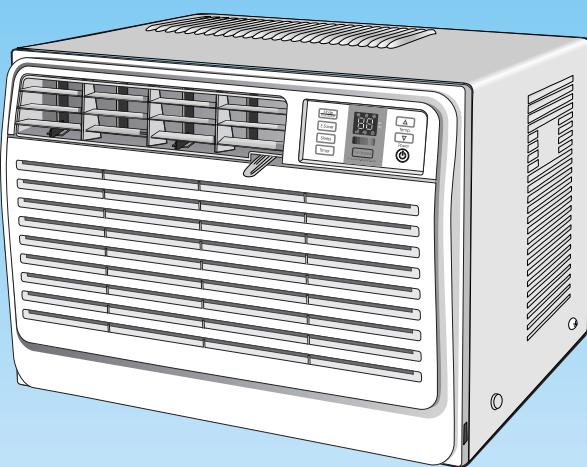
SAMSUNG

ROOM AIR CONDITIONER

AW0503B	AW0505B
AW0603B	AW0605B
AW0803B	AW0805B
AW1003B	AW1005B
AW1203B	AW1205B
AW1403B	
AW1803B	AW1805B

SERVICE Manual

AIR CONDITIONER



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SAM0001

1. Precautions

1. Warning: Prior to repair, disconnect the power cord from the circuit breaker.
2. Use proper parts: Use only exact replacement parts. (Also, we recommend replacing parts rather than repairing them.)
3. Use the proper tools: Use the proper tools and test equipment, and know how to use equipment may cause problems later-intermittent contact, for example.
4. Power Cord: Prior to repair, check the power cord and replace it if necessary.
5. Avoid using an extension cord, and avoid tapping into a power cord. This practice may result in malfunction or fire.
6. After completing repairs and reassembly, check the insulation resistance.
Procedure: Prior to applying power, measure the resistance between the power cord and the ground terminal. The resistance must be greater than 30 megaohms.
7. Make sure that the grounds are adequate.
8. Make sure that the installation conditions are satisfactory.
Relocate the unit if necessary.
9. Keep children away from the unit while it is being repaired.
10. Be sure to clean the unit and its surrounding area.

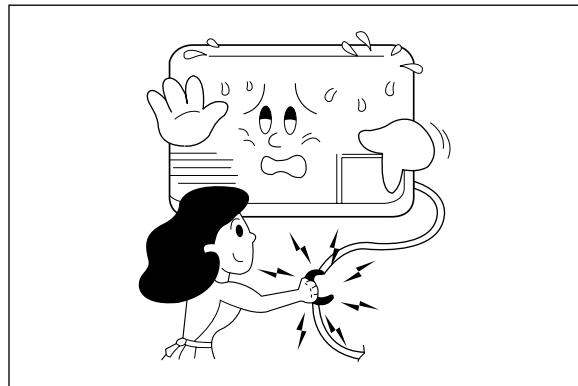


Fig. 1-1 Avoid Dangerous Contact

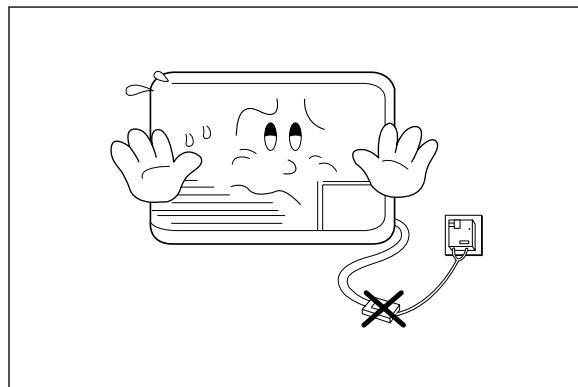


Fig. 1-2 No Tapping and No Extension Cords

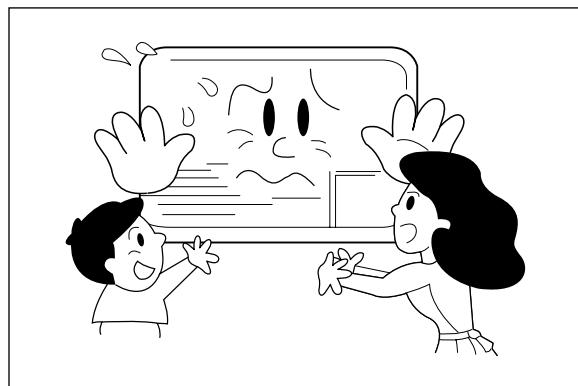


Fig. 1-3 No Kids Nearby!

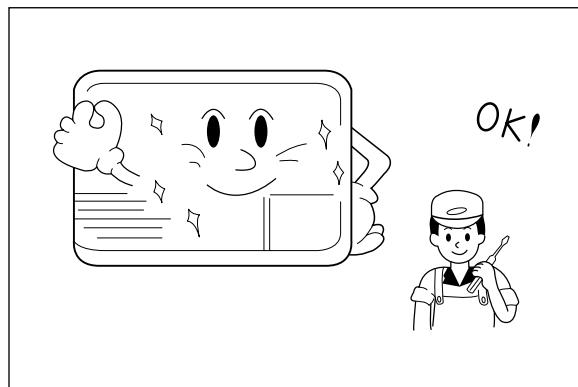


Fig. 1-4 Clean the Unit

2. Product Specifications

2-1 Table

Item	Unit of Measure	AW0503B	AW0505B	AW0603B	AW0605B
Type		WINDOW			
Dimension: (Width×Height×Depth)	mm	424×310×326			
Voltage	Volt	115			
Phase	-	SINGLE			
Frequency	Hz	60			
Operation Current	A	4.8	4.8	5.7	5.7
Power Consumption	W	530	530	630	630
Refrigerant Type	FREON	R22			
Refrigerant Change	g	310	300	300	300
Capacity	BTU/h	5200	5200	6100	6100
EER	BTU/h.W	9.8	9.8	9.7	9.7
Net Weight	Kg	18.5	18.5	19	19
Condenser	Row	2×15	2×15	2×15	2×15
Condenser Fan	Type	Propeller Fan			
Evaporator	Row	2×10	2×10	2×10	2×10
Evaporator Fan	Type	Blower			
Fan Motor	MODEL	YSLA-30-6-0005	YSLA-30-6-0005	YSLA-30-6-0005	YSLA-30-6-0005
Compressor(Rotary)	MODEL	2R7S126BUC	39A050HSAKA	39A062HSAKA	39A062HSAKA
Overload Protect	-	MRA99811-9201	KA-122-LBDN61K	KA-122-LLCN00B	KA-122-LLCN00B
Compressor Capacitor	μ F/VAC	35/270	35/270	40/270	40/270
Fan Motor Capacitor	μ F/VAC	3.5/270	3.5/270	3.5/27	3.5/27
Fan Speed	RPM	1060/1010/960	1060/1010/960	1060/1010/960	1060/1010/960
Thermo Control	-	THERMISTOR			

2-1 Table(CONT.)

Item	Unit of Measure	AW0803B	AW0805B	REMARK
Type		WINDOW	WINDOW	
Dimension: (Width×Height×Depth)	mm	500×355×461	500×355×461	
Voltage	Volt	115	115	
Phase	-	SINGLE	SINGLE	
Frequency	Hz	60	60	
Operation Current	A	7.4	7.4	
Power Consumption	W	820	820	
Refrigerant Type	FREON	R22	R22	
Refrigerant Change	g	320	320	
Capacity	BTU/h	8000	8000	
EER	BTU/h.W	9.8	9.8	
Net Weight	Kg	26.5	26.5	
Condenser	Row	2×16(L-Bending)	2×16(L-Bending)	
Condenser Fan	Type	Propeller Fan	Propeller Fan	
Evaporator	Row	2×11	2×11	
Evaporator Fan	Type	Blower	Blower	
Fan Motor	MODEL	YSK40-6S-1	YSK40-6S-1	
Compressor(Rotary)	MODEL	44A080HUAEB	44A080HUAEB	
Overload Protect	-	KA-122LFGN17K	KA-122LFGN17K	
Compressor Capacitor	μ F/VAC	45/370	45/370	
Fan Motor Capacitor	μ F/VAC	8/450	8/450	
Fan Speed	RPM	1030/980/920	1030/980/920	
Thermo Control	-	THERMISTOR		

2-1 Table(CONT.)

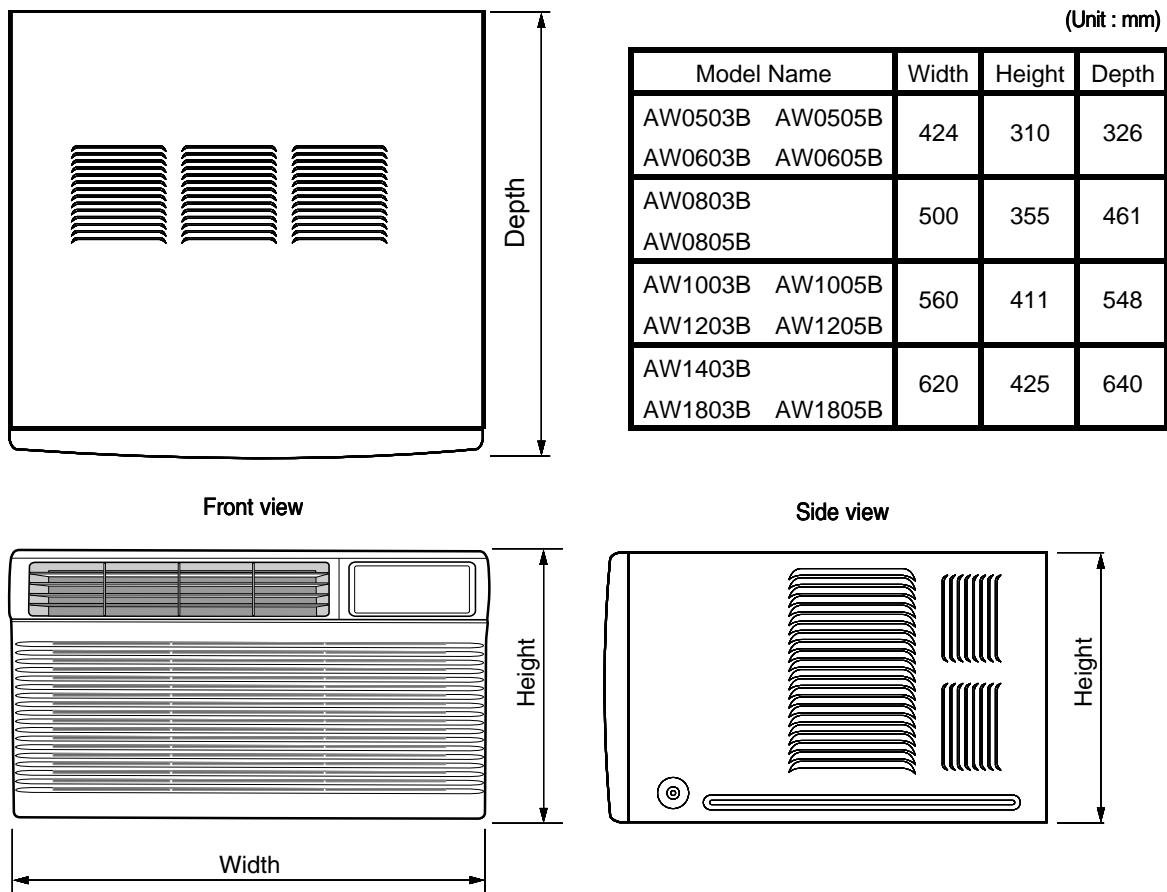
Item	Unit of Measure	AW1003B	AW1005B	AW1203B	AW1205B
Type		WINDOW			
Dimension: (Width×Height×Depth)	mm	560×411×548			
Voltage	Volt	115			
Phase	-	SINGLE			
Frequency	Hz	60			
Operation Current	A	9.2	9.2	11.3	11.3
Power Consumption	W	1040	1040	1240	1240
Refrigerant Type	FREON	R22			
Refrigerant Change	g	390	390	560	560
Capacity	BTU/h	10200	10200	12400	12400
EER	BTU/h.W	9.8	9.8	9.8	9.8
Net Weight	Kg	37	37	38.5	38.5
Condenser	Row	2×17(L-Bending)	2×17(L-Bending)	3×17(L-Bending)	3×17(L-Bending)
Condenser Fan	Type	Propeller Fan			
Evaporator	Row	2×12	2×12	2×10(Φ 9.52)	2×10(Φ 9.52)
Evaporator Fan	Type	Blower			
Fan Motor	MODEL	YGN60-6B-2	YGN60-6B-2	YGN60-6B-1	YGN60-6B-1
Compressor(Rotary)	MODEL	2P16S126B1G	2P16S126B1G	2P18S126B1H	2P18S126B1H
Overload Protect	-	MRA98695	MRA98695	MRA98896-9200	MRA98896-9200
Compressor Capacitor	μ F/VAC	45/370	45/370	45/370	45/370
Fan Motor Capacitor	μ F/VAC	15/250	15/250	15/250	15/250
Fan Speed	RPM	930/890/850	930/890/850	900/850/800	900/850/800
Thermo Control	-	THERMISTOR			

2-1 Table(CONT.)

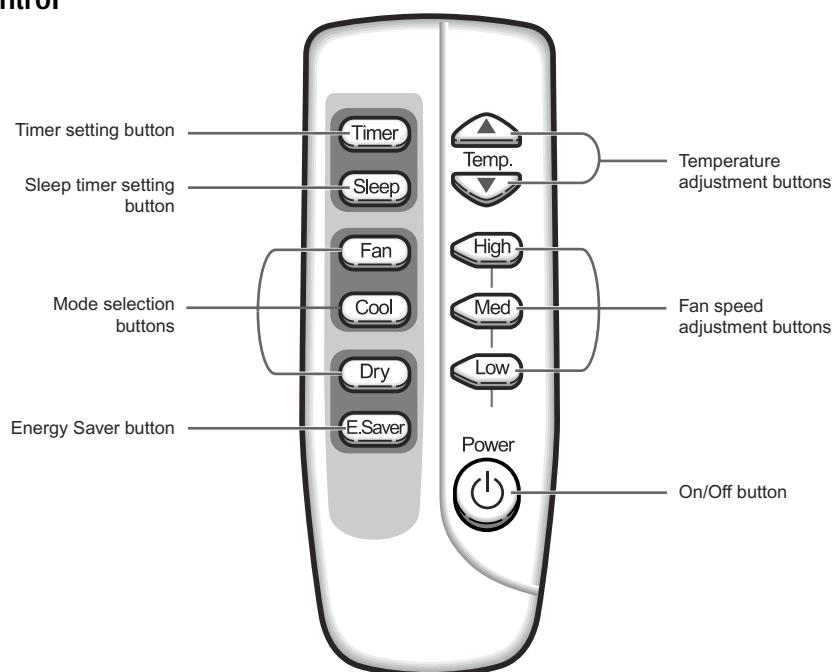
Item	Unit of Measure	AW1403B	AW1803B	AW1805B
Type		WINDOW		
Dimension: (Width×Height×Depth)	mm	620×425×640		
Voltage	Volt	115	230/208	
Phase	-	SINGLE		
Frequency	Hz	60		
Operation Current	A	12.0	8.2/8.8	8.2/8.8
Power Consumption	W	1400	1850/1800	1850/1800
Refrigerant Type	FREON	R22		
Refrigerant Change	g	580	700	700
Capacity	BTU/h	14000	17900/17400	17900/17400
EER	BTU/h.W	10.0	9.7/9.7	9.7/9.7
Net Weight	Kg	48.0	54.5	54.5
Condenser	Row	2×19(L-Bending)	2×19(L-Bending)	2×19(L-Bending)
Condenser Fan	Type	Propeller Fan		
Evaporator	Row	2×11(Φ 9.52)	3×11(Φ 9.52)	3×11(Φ 9.52)
Evaporator Fan	Type	Blower		
Fan Motor	MODEL	YGN59-6B	YSK160-6A-3	YSK160-6A-3
Compressor(Rotary)	MODEL	44B135HX1EL	48D180IU1EQ	48D180IU1EQ
Overload Protect	-	MRA98693-12007	MRA12046-12007	MRA12046-12007
Compressor Capacitor	μ F/VAC	50/370	35/450	35/450
Fan Motor Capacitor	μ F/VAC	15/450	6/450	6/450
Fan Speed	RPM	900/850/800	1050/1000/960	1050/1000/960
Thermo Control	-	THERMISTOR		

2-2 Dimensions

2-2-1 Main Unit



2-2-2 Remote Control



3. Installation and Operating Instructions

3-1 Installation

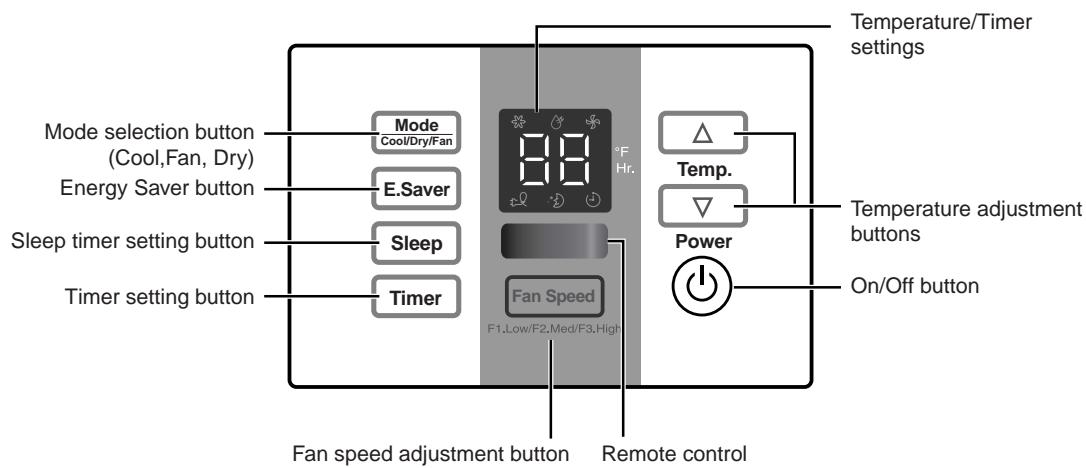
3-1-1 Selecting Area for Installation

1. Make sure that you install the unit in an area providing good ventilation. The air conditioner must not be blocked by any obstacle affecting the air flow near the air inlet and air outlet.
2. Make sure that you install the unit in an area that allow good air handling. The installation area must be able to endure vibration from the unit.
3. Make sure that you install the unit away from heat or vapor.
4. Make sure that you install the unit in an area which is cool and has adequate space.
5. Make sure that you install the unit in an area away from TVs, audio units, cordless phones, fluorescent lighting fixtures and other electrical appliances (obtain a clearance of at least one meter).
6. Make sure that you install the unit in an area which provides easy drainage for condensed water.
7. Make sure that you install the unit in an area not exposed to rain or direct sunlight.
(Install a separate sunblind if exposed to direct sunlight.)
8. Make sure that you install the unit in an area allowing good air movement. Do not install it in a space that would cause noise amplification of noise.
9. Fix the unit firmly if mounted in a high place.

Caution:

Do not use the air conditioner in the following environments : greasy areas (including areas near machines), or marine areas. Contact your local dealer for advice.

3-2 Function Description



3-2-1 Cooling operation mode

The compressor is turned on and off according to the ambient temperature and set temperature.

- 1) Compressor on and off control
 - Compressor on and off control according to the ambient temperature
 - * The compressor is turned off when "ambient temperature = set temperature"
 - * The compressor is turned on when "ambient temperature = set temperature +1°C"
- 2) Default value after power reset → set temperature = 24°C
Fan speed = High
- 3) Set temperature indicating (setting) range : 1°C interval from 18°C to 30°C.

3-2-2 Fan operation mode

- 1) If "Fan operation mode" signal is received from remocon or panel.
 - the compressor is immediately turned off and only fan motor is operated at set blowing speed.
 - it changes such as "High → Med → Low → High"(if Fan speed is selected).
- 2) The initial Fan motor speed is set to "High".
- 3) The set temperature can not be indicated and set.

3-2-3 Energy saver operation mode

- * If the compressor turn off at the cooling operation, the fan motor turn off after operation during the fixation time only, and operation that energy saver by turn off the fixation time only, and operation that energy saver by turn off the motor continuously before the condition of the compressor on.
- * The fan motor is not operated at flow wind operation.
- * Energy saver operation specification at the cooling operation.
 - 1) Fan motor control in compressor on : operate with setting wind speed
 - 2) Fan motor control in compressor off : After compressor off, the fan motor is operated breeze for 2 minutes and then it turn off.
- 3) After the fan motor off, the compressor and fan motor is operated normally when the compressor on.

3-2-4 Sleep operation mode

- 1) Enable to sleep operation only when cooling operation.
- 2) First, 7-SEG LED DISPLAY "SLEEP" while 15 second, Second, 7-SEG LED DISPLAY "8Hr"
And, automatically SET OFF after operated while 8 Hour
- 3) If sleep operation, setting Temperature rise 1°C after 1 Hour
- 4) ON TIMER operation, not operation, ENERGY SAVER operation, not sleep operation.

3-2-5 Dry operation mode

Same as Cool operation mode.

3-2-6 LED display indication in case of error detection

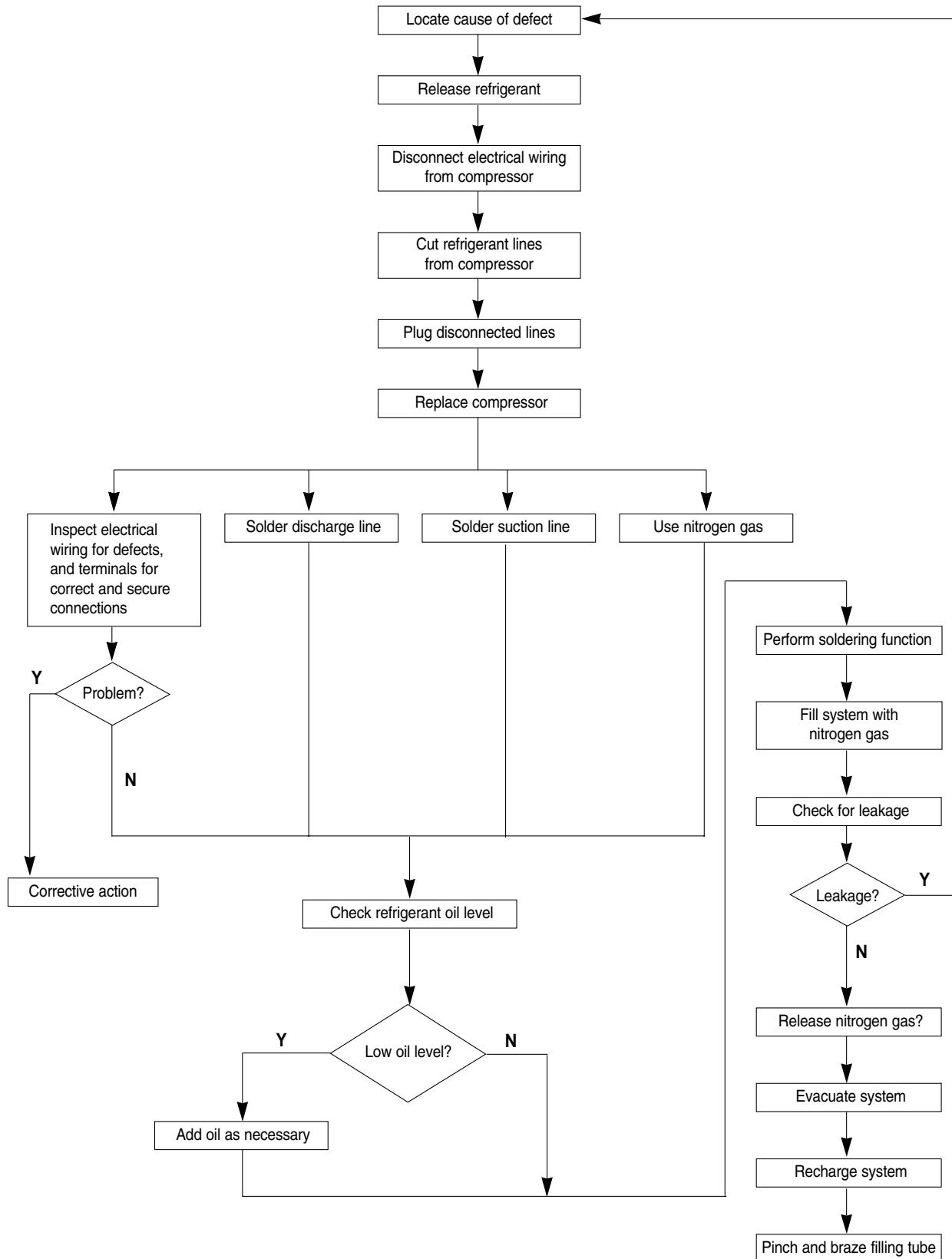
ERROR OPERATION	7-SEG LED DISPLAY
ROOM THERMISTOR (OPEN or SHORT)	E1 displayed

- 1) Set operation in case of error occurrence.
 - Malfunction of each temperature sensor (open, short)
 - Error mode display, warning sound.
 - The operation status is off.

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4. Disassembly and Reassembly

4-1 Compressor Replacement Flow Chart



4-2 Checking the oil

Fill the transparent container with 10cc of oil, and then conduct the test.

4-2-1 Oil quality

Condition of Refrigerant Cycle	Oil Condition		Remarks
	Color	Odor	
Normal	Straw Yellow	No Odor	Return with the system
Over-heated	Brown Color	-	Change the oil
Compressor Damage	Dark Brown	Pungent oil	Change the oil

4-2-2 Replacing and refilling the refrigerant oil

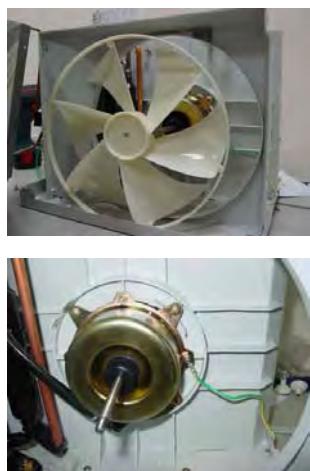
1. Change the compressor - DO NOT recharge the oil as the compressor itself is already charged.
2. Change the condenser add 50cc
3. Change the evaporator add 50cc
4. When the refrigerant is replaced add 30cc oil.
5. After vacuum is completed, the oil is filled through the high pressure side.
6. In the event of a refrigerant leak, generally it is not necessary to add oil.
(Unless the oil has leaked significantly)

4-3. Disassembly and Reassembly Procedure(AW0503B/AW0505B/AW0603B/AW0605B)

Stop operating the air conditioner, and pull out the power cord before repair.

No.	Part Name	Procedures	Remarks
1	Ass'y Grille	<p>1.Pull the Grille air inlet and Guard air filter out. (Pull both sides of Grille air inlet forward carefully, then take out the filter.)</p> <p>2.Remove the screw fixed on the panel front.</p> <p>3.Hold the lower part of panel with two hands while pressing down on both sides of the lower part of the cabinet, pull it forward by about 30mm, and then lift it up carefully for removal.</p>	 
2	Ass'y Cabinet	<p>1.Remove all screws on the both side of the cabinet .</p> <p>2.Take the cabinet upward.</p>	
3	Ass'y Control	<p>1.Remove the earth screw fixed on the base.</p> <p>2.Remove 3 screws fixed on the partition.</p> <p>3.Remove the screw fixed for the power cord.</p> <p>4.Un-connect the motor wire and comp lead wire, then take out the control box upward.</p>	 <p>(The picture maybe have a little different from actual product)</p>

Disassembly and Reassembly Procedure(AW0503B/AW0505B/AW0603B/AW0605B)

No.	Part Name	Procedures	Remarks
4	CASE EVAP UP & ASSY EVAP	<p>1.Take the case evap up forward carefully. (tear all the seal on it before)</p> <p>2.Pull the frame up upward.</p>	
5	Blower	<p>1.Remove all screws on the evaporator.</p> <p>2.Pull the evaporator from frame low carefully.</p> <p>3.Remove the nut and remove the Blower.</p>	
6	Case Cond & Fan Propeller & Motor Fan	<p>1.Remove 2 screws on the rear side of the base pan, and all screws fixed on case cond.</p> <p>2.Pull up the condenser from the base pan.</p> <p>3.Remove the nut and remove the Propeller fan.</p> <p>4.Remove the screw fixed on the partition and earth screw fixed on the base pan, then take out the motor backward.</p>	

Disassembly and Reassembly Procedure(AW0803B/AW0805B)

Stop operating the air conditioner, and pull out the power cord before repair.

No.	Part Name	Procedures	Remarks
1	Ass'y Grille	<p>1.Pull the Grille air inlet and Guard air filter out. (Pull both sides of Grille air inlet forward carefully, then take out the filter.)</p> <p>2.Remove the screw fixed on the panel front.</p> <p>3.Hold the lower part of panel with two hands while pressing down on both sides of the lower part of the cabinet, pull it forward by about 30mm, and then lift it up carefully for removal.</p>	 
2	Ass'y Cabinet	<p>1. Remove the screws on both sides of the cabinet to disconnect the cabinet and frame.</p> <p>2. Pull the handle on the front side of the bottom, and remove the unit from the cabinet.</p>	
3	Ass'y Control	<p>1.Remove the earth screw fixed on the plate evaporator</p> <p>2.Remove 3 screws fixed on the partition and plate evaporator casing.</p> <p>3.Remove the screw fixed for the power cord.</p> <p>4.Un-connect the motor wire and comp lead wire, then take out the control box upward.</p>	 <p>(The picture maybe have a little different from actual product)</p>

Disassembly and Reassembly Procedure(AW0803B/AW0805B)

No.	Part Name	Procedures	Remarks
4	CASE EVAP UP & ASSY EVAP	<p>1.Take the case evap up forward carefully.</p> <p>2.Remove 4 screws fixed on the plate evaporator casing and evaporator.</p>	 
5	Blower	<p>1.Lift up the evaporator carefully.</p> <p>2.Remove 2 screws on the plate evaporator casing and partition.</p> <p>3. Lift up the plate evaporator casing.</p> <p>4.Remove the nut and remove the Blower.</p>	
6	Case Cond & Fan Propeller & Motor Fan	<p>1.Remove 2 screws on the base pan, and all screws fixed on case cond.</p> <p>2.Pull up the condenser from the base pan.</p> <p>3.Remove the nut and remove the Propeller fan.</p> <p>4.Remove the screw fixed on the partition and earth screw fixed on the base pan, then take out the motor backward.</p>	 

Disassembly and Reassembly Procedure(AW1003B/AW1005B/AW1203B/AW1205B/AW1403B/AW1803B/AW1805B)

Stop operating the air conditioner, and pull out the power cord before repair.

No.	Part Name	Procedures	Remarks
1	Ass'y Grille	<p>1.Pull the Grille air inlet and Guard air filter out. (Pull both sides of Grille air inlet forward carefully, then take out the filter.)</p> <p>2.Remove the screw fixed on the panel front.</p> <p>3.Hold the lower part of panel with two hands while pressing down on both sides of the lower part of the cabinet, pull it forward by about 30mm, and then lift it up carefully for removal.</p>	 
2	Ass'y Cabinet	<p>1. Remove the screws on both sides of the cabinet to disconnect the cabinet and frame.</p> <p>2. Pull the handle on the front side of the bottom, and remove the unit from the cabinet.</p>	
3	Ass'y Control	<p>1.Remove the earth screw fixed on the plate evaporator</p> <p>2.Remove all screws fixed on the partition and plate evaporator casing.</p> <p>3.Remove the screw fixed for the power cord.</p> <p>4.Un-connect the motor wire and comp lead wire, then take out the control box upward.</p>	 <p>(The picture maybe have a little different from actual product)</p>

Disassembly and Reassembly Procedure(AW1003B/AW1005B/AW1203B/AW1205B/AW1403B/AW1803B/AW1805B)

No.	Part Name	Procedures	Remarks
4	CASE EVAP UP & ASSY EVAP	<p>1.Take the case evap up forward carefully.</p> <p>2.Remove 4 screws fixed on the plate evaporator casing and evaporator.</p>	 
5	Blower	<p>1.Lift up the evaporator carefully.</p> <p>2.Remove 2 screws on the plate evaporator casing and partition.</p> <p>3. Lift up the plate evaporator casing.</p> <p>4.Remove the nut and remove the Blower.</p>	
6	Case Cond & Fan Propeller & Motor Fan& Mount motor	<p>1.Remove 2 screws on the base pan, and all screws fixed on case cond.</p> <p>2.Pull up the condenser from the base pan.</p> <p>3.Remove the nut and remove the Propeller fan.</p> <p>4.Remove 4 screws fixed on the plate reinf, then take out the case cond.</p> <p>5.Remove 4 screws fixed on the mount motor then take out the motor backward.</p> <p>6.Remove 4 screws fixed on the base and partition then remove the mount motor.</p>	  

5. Troubleshooting

Check the basic checkpoints first to determine whether it is machine trouble or a problem in the operation method. When it is not related to the basic checkpoints, perform checking in accordance with the procedures of troubleshooting by symptom.

5-1 Basic Checkpoints for Troubleshooting

- 1) Is the voltage of the power source appropriate ?
 - (1) It should be within the rating voltage $\pm 10\%$ range.
 - (2) The air conditioner may not operate properly when the voltage is out of this range.
- 2) Is the connection with the fan motor, compressor wire, and starting condenser appropriately made ?
- 3) The symptoms listed in the table below are not indicative of machine trouble.

Symptom	Cause and check
No operation	<ul style="list-style-type: none">• Check whether there is power failure or the power plug is pulled out.• Check whether the unit is stopped as a result of completion of the sleep time.• Pull out the power plug for ten seconds, and then insert it again.
Air flows, but no cooling	<ul style="list-style-type: none">• Check whether the Air filter is clogged with dust or is dirty.• Check whether the desired temperature is too high. Set the desired temperature to a lower level than the current temperature.• Check whether it is in "FAN" mode.
The remocon does not operate	<ul style="list-style-type: none">• Check whether battery is completely depleted.• Check whether the battery is properly inserted.• Check whether the receiving window of the remocon for the assembly main PCB is blinded.• Check whether the remocon is affected by jamming due to a neon sign.
No temperature setting	<ul style="list-style-type: none">• Check whether the unit is in "FAN" mode. (In "FAN" mode, only the current temperature is displayed, and the desired temperature is not set.)

✿ Checking and Display of Fault Area

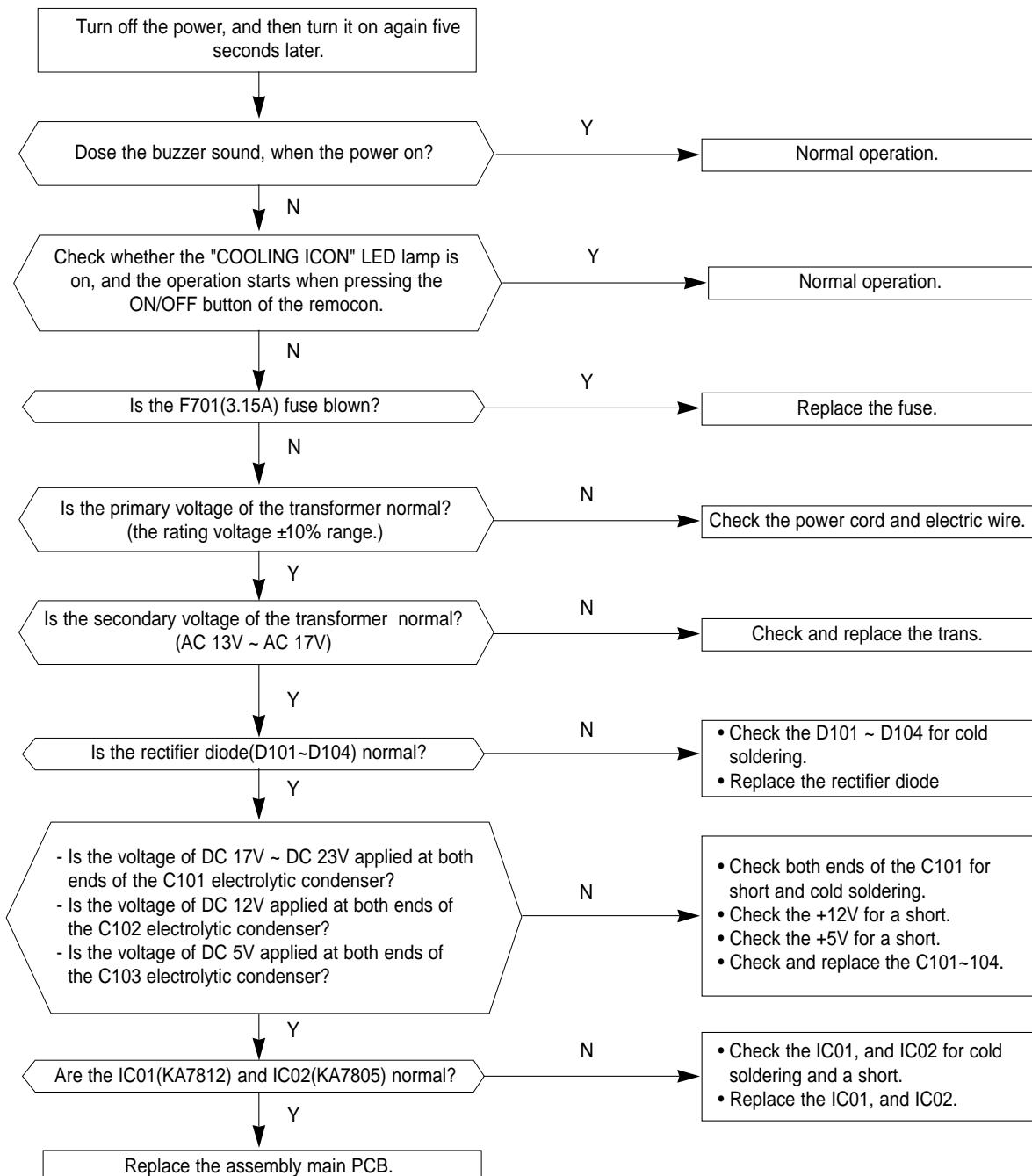
ERROR OPERATION	ERROR OPERATION
ROOM THERMISTOR (OPEN OR SHORT)	E1 displayed

5-2 Troubleshooting by Symptom

5-2-1 No power

1) Check points

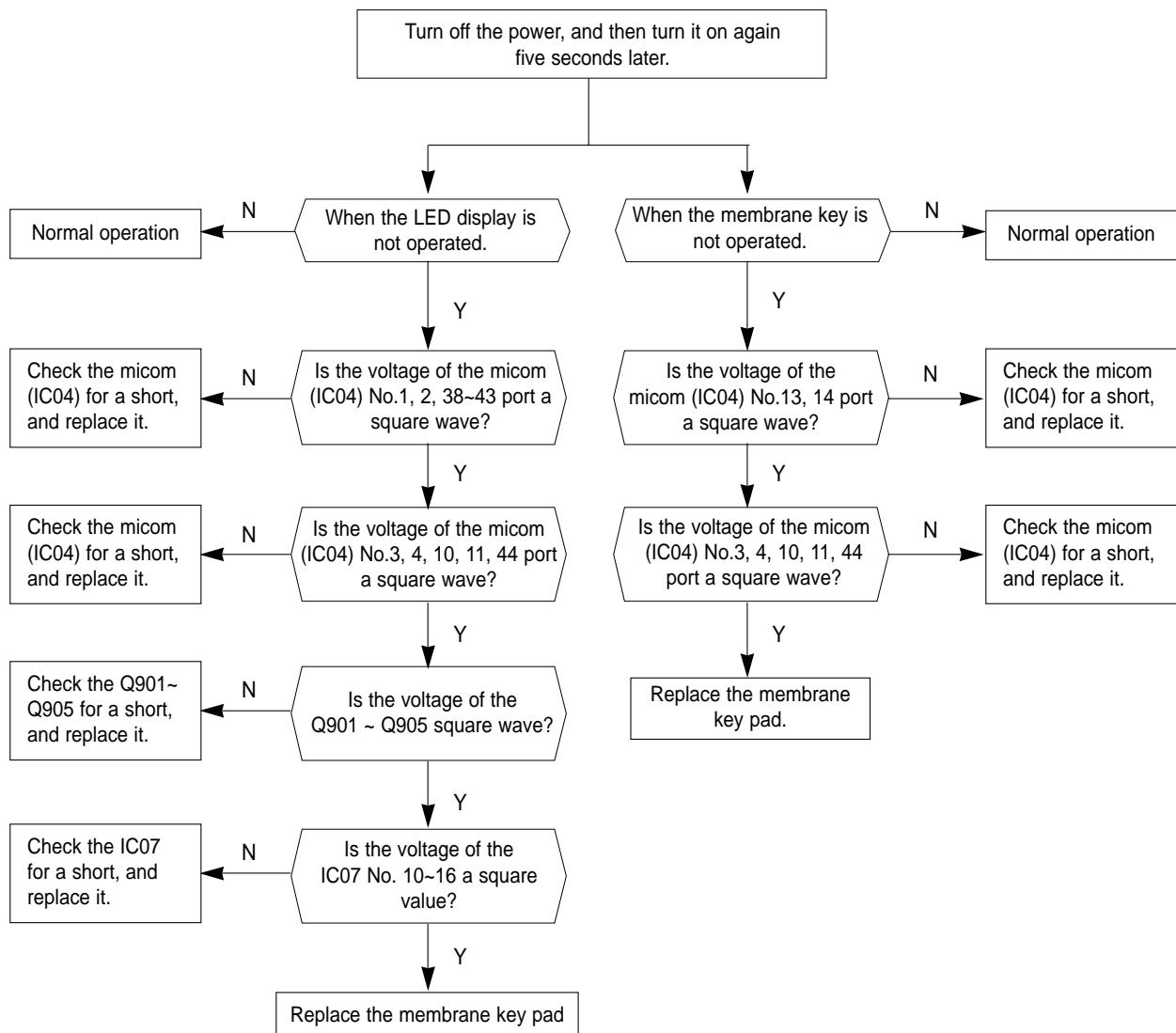
- (1) Is the voltage of the power source normal ? (the rating voltage $\pm 10\%$ range.)
- (2) Is the electric wire in good contact ?(CN 71, RY 71)
- (3) Is the output voltage of the IC01(KA 7812) normal ?(DC 11.5V ~ DC 12.5V)
- (4) Is the output voltage of the IC02(KA 7805) normal ?(DC 4.5V ~ DC 5.5V)



5-2-2 When the Membrane Key pad and Led Display

1) Check points

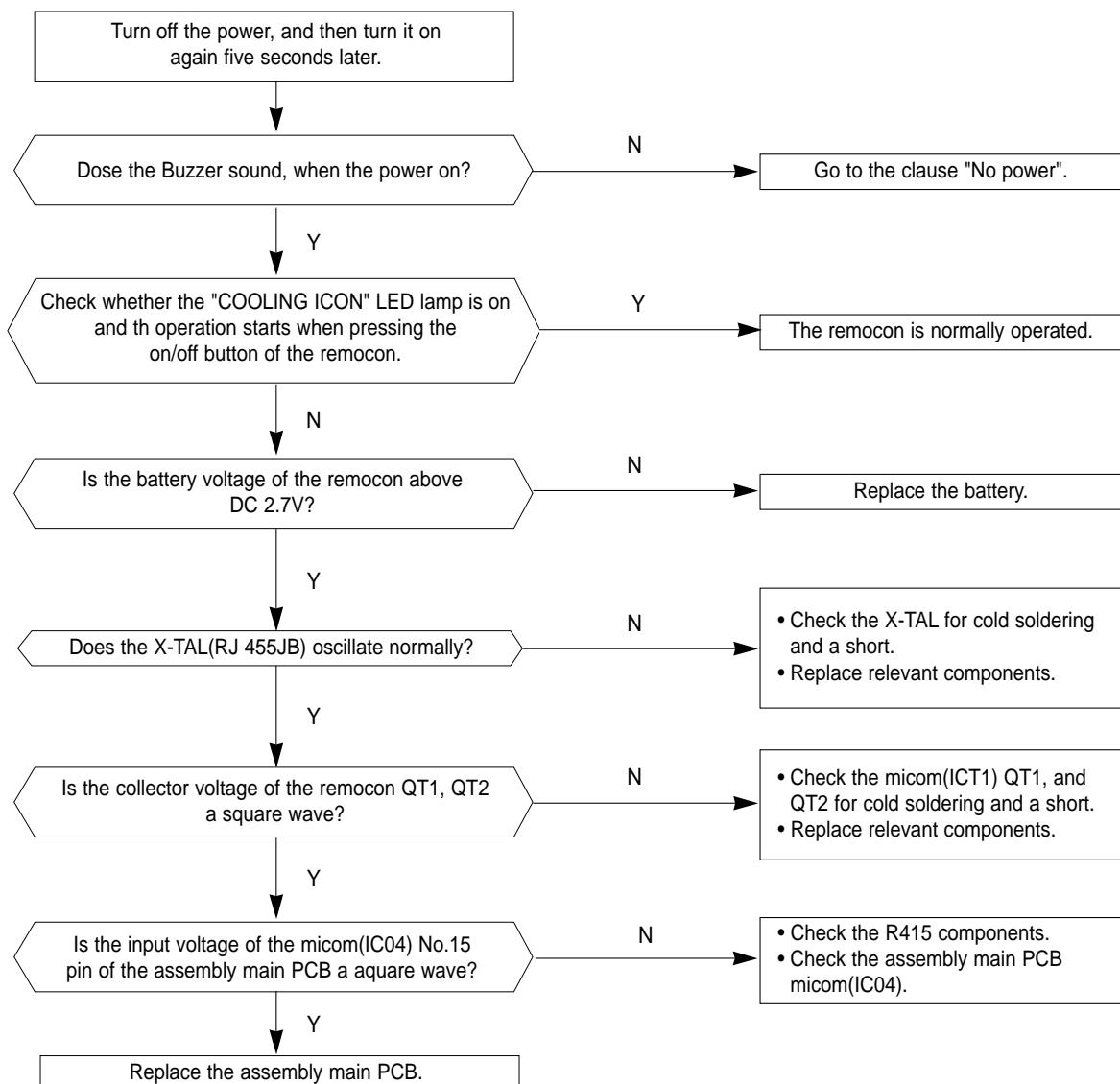
- (1) Is the voltage of the power source normal ? (the rating voltage ±10% range.)
- (2) Is the electric wire in good contact ?(CN71, RY71)
- (3) Is the connection of the assembly main PCB, and MEMBRANE KEY PAD in good contact? (CN91)



5-2-3 When the remocon is not operated

1) Check points

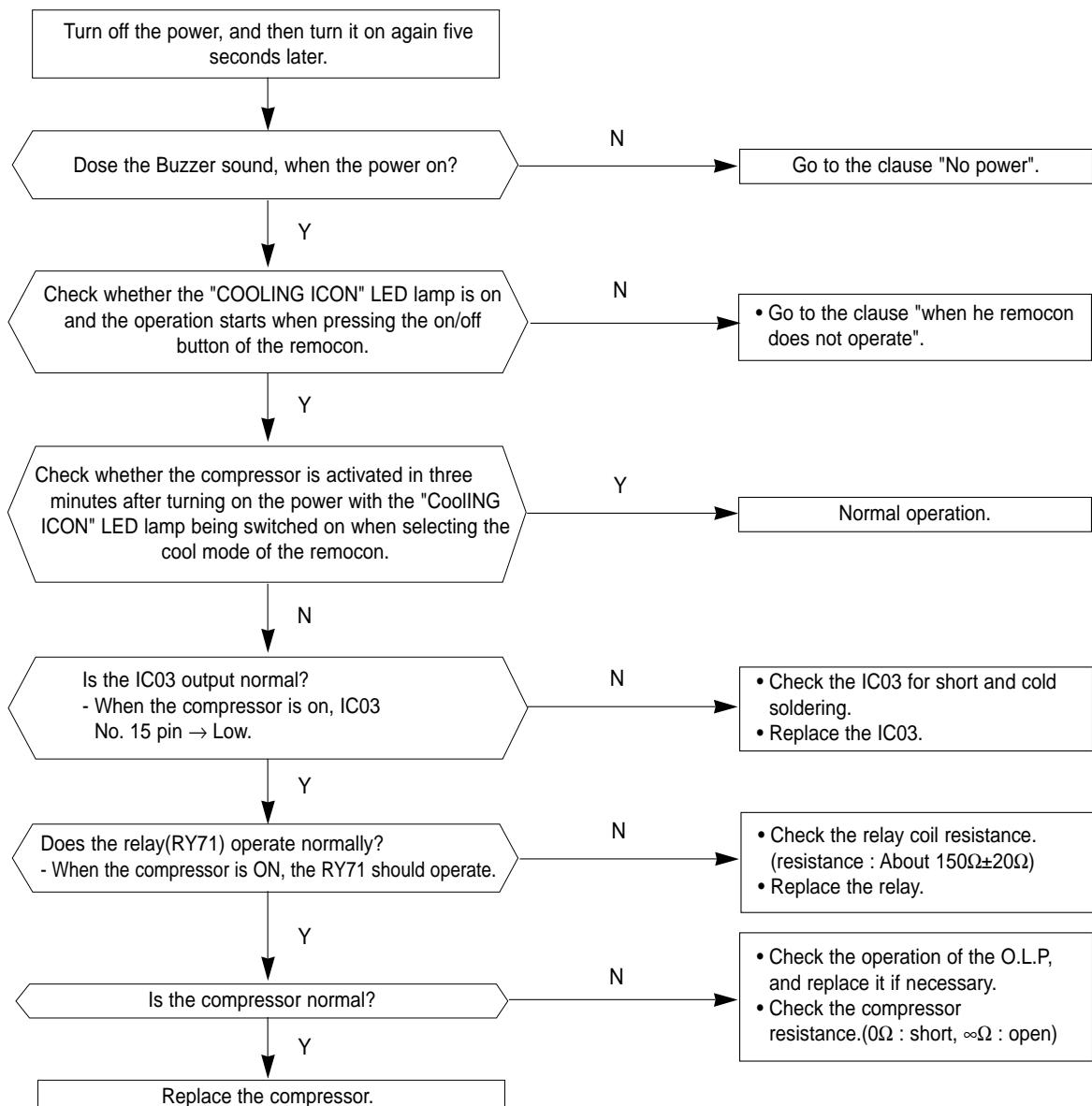
- (1) Is the voltage of the power source normal ? (the rating voltage $\pm 10\%$ range.)
- (2) Is the electric wire in good contact ? (CN71, RY71)
- (3) Is the assembly main PCB in good contact with the MEMBRANE KEY PAD(CN91)
- (4) Is the battery voltage of the remocon above DC 2.7V?



5-2-4 When the compressor is not operated

1) Check points

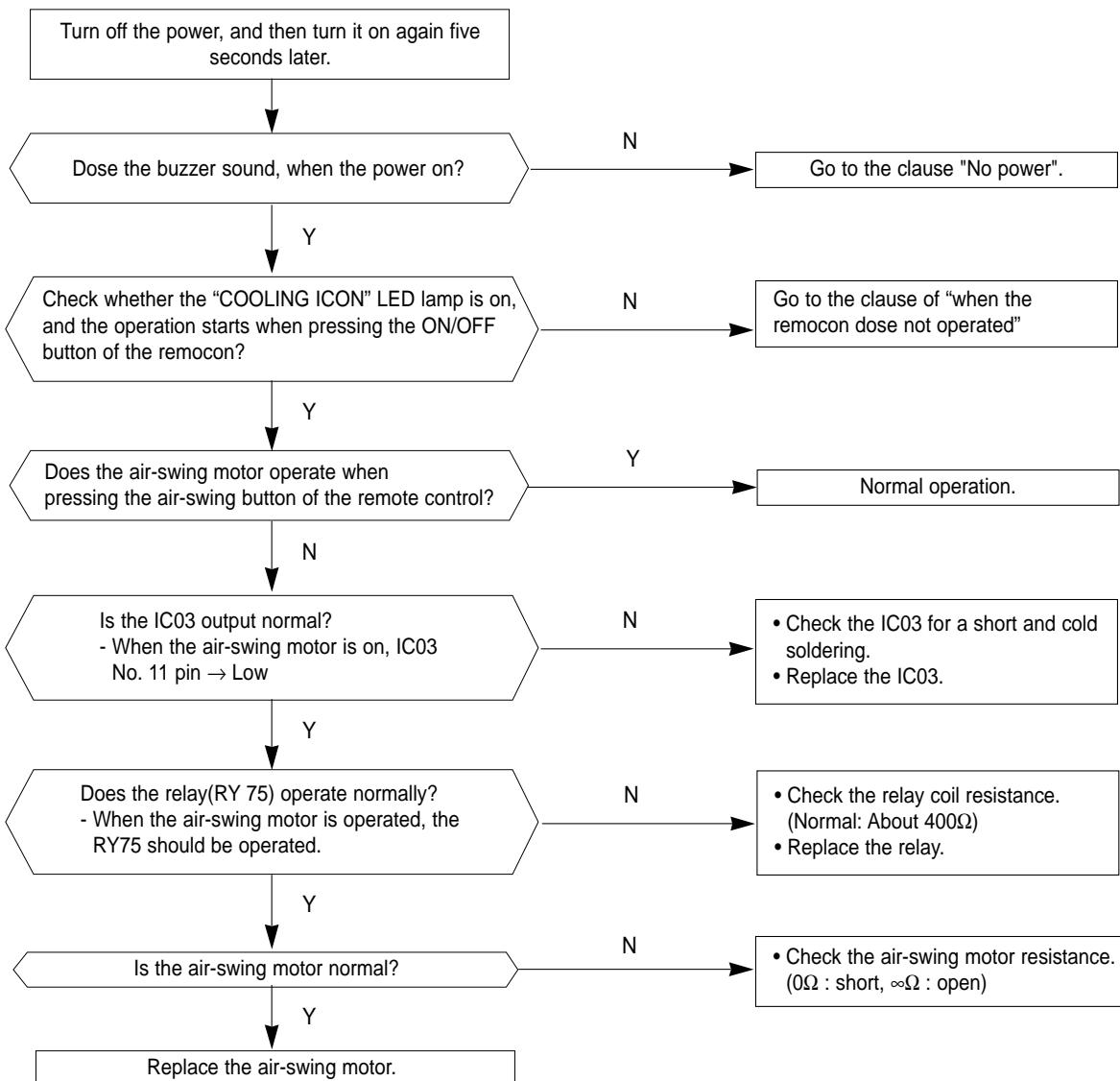
- (1) Is the voltage of the power source normal ? (the rating voltage $\pm 10\%$ range.)
- (2) Is the desired temperature lower than the indoor temperature in the "COOL" mode?
(Compressor stopped)
- (3) Is the starting condenser in good contact?
- (4) Is the electric wire in good contact ? (CN71, RY71)
- (5) Is the output voltage of the IC01(KA7812) and IC02(KA7805) normal ?



5-2-5 When the air swing motor is not operated

1) Check points

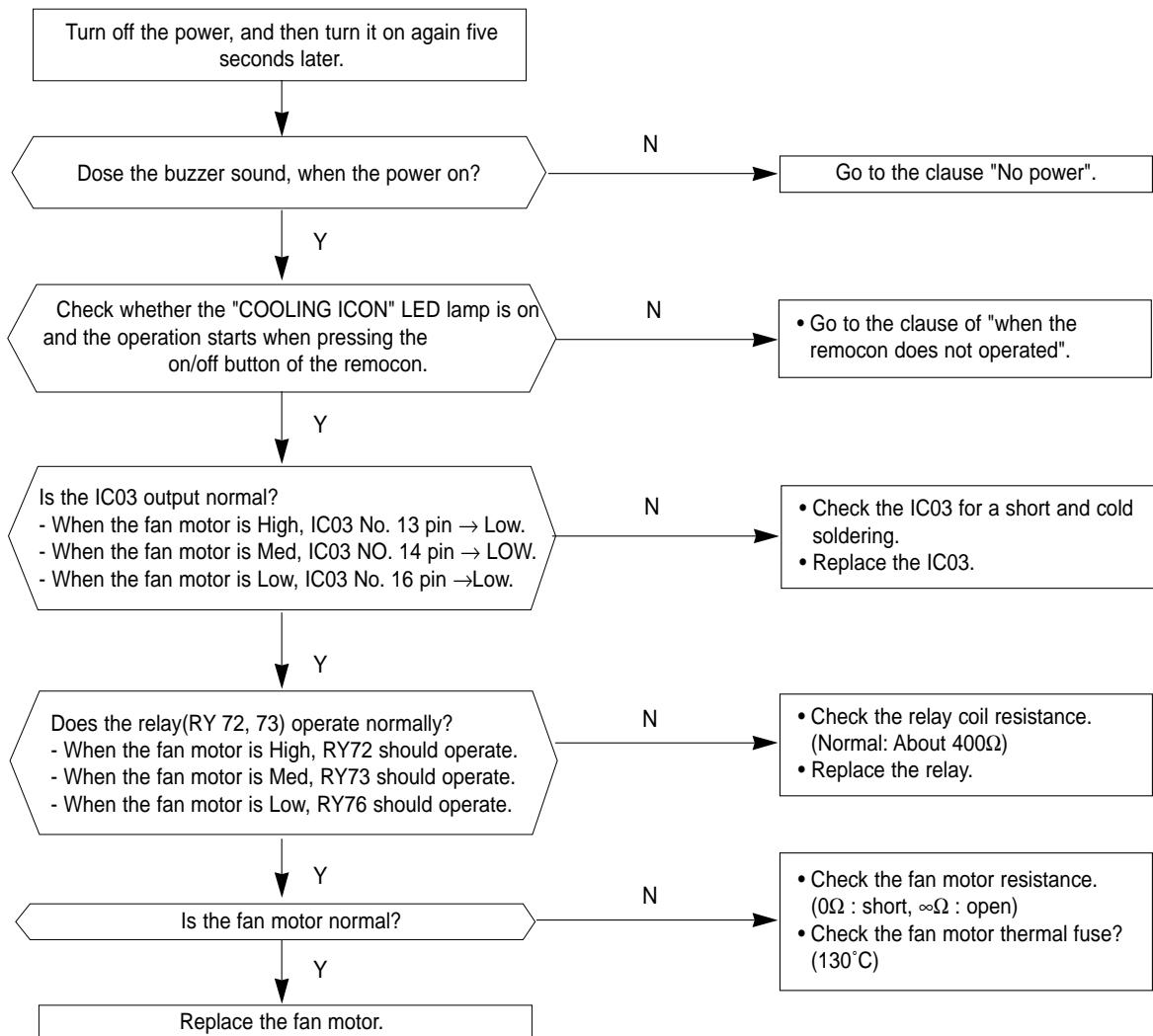
- (1) Is the voltage of the power source normal ? (the rating voltage ±10% range.)
- (2) Is the electric wire in good contact ?(CN71, RY71)
- (3) Is the swing motor connector in good contact?(CN71)
- (4) Is the terminal connected to the swing motor in good contact?
- (5) Is the output voltage of the IC01(KA7812) and IC02(KA7805) normal?



5-2-6 When the fan motor does not operated

1) Check points

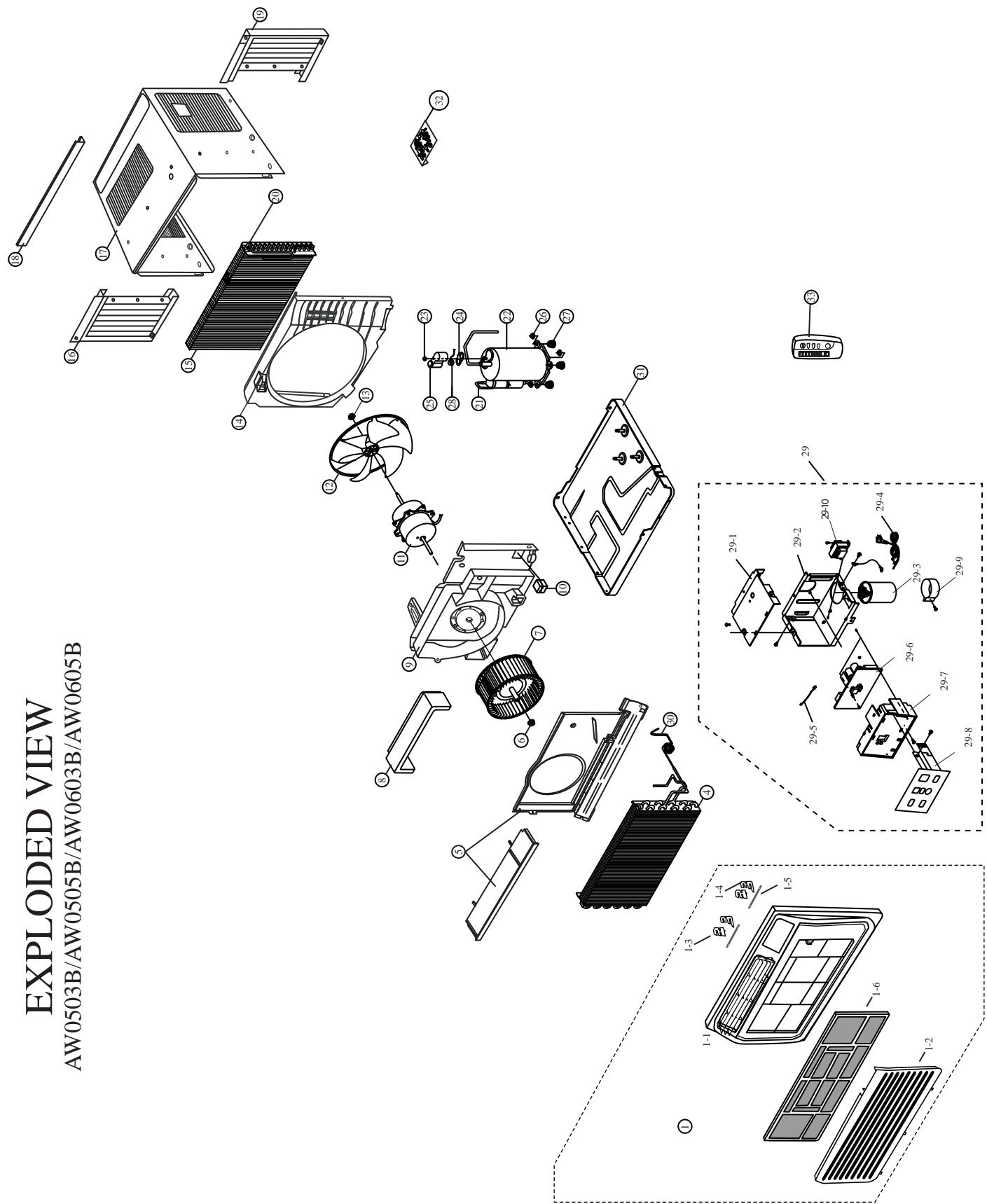
- (1) Is the voltage of the power source normal ? (the rating voltage $\pm 10\%$ range.)
- (2) Is the electric wire in good contact ?(CN71, RY71)
- (3) Is the starting condenser(FAN MOTOR) in good contact?
- (4) Is the fan motor connector in good contact?(CN73)
- (5) Is the output voltage of the IC01(KA7812) and IC02(KA7805) normal ?



MEMO

6. Exploded View and Parts List

6-1 Main unit



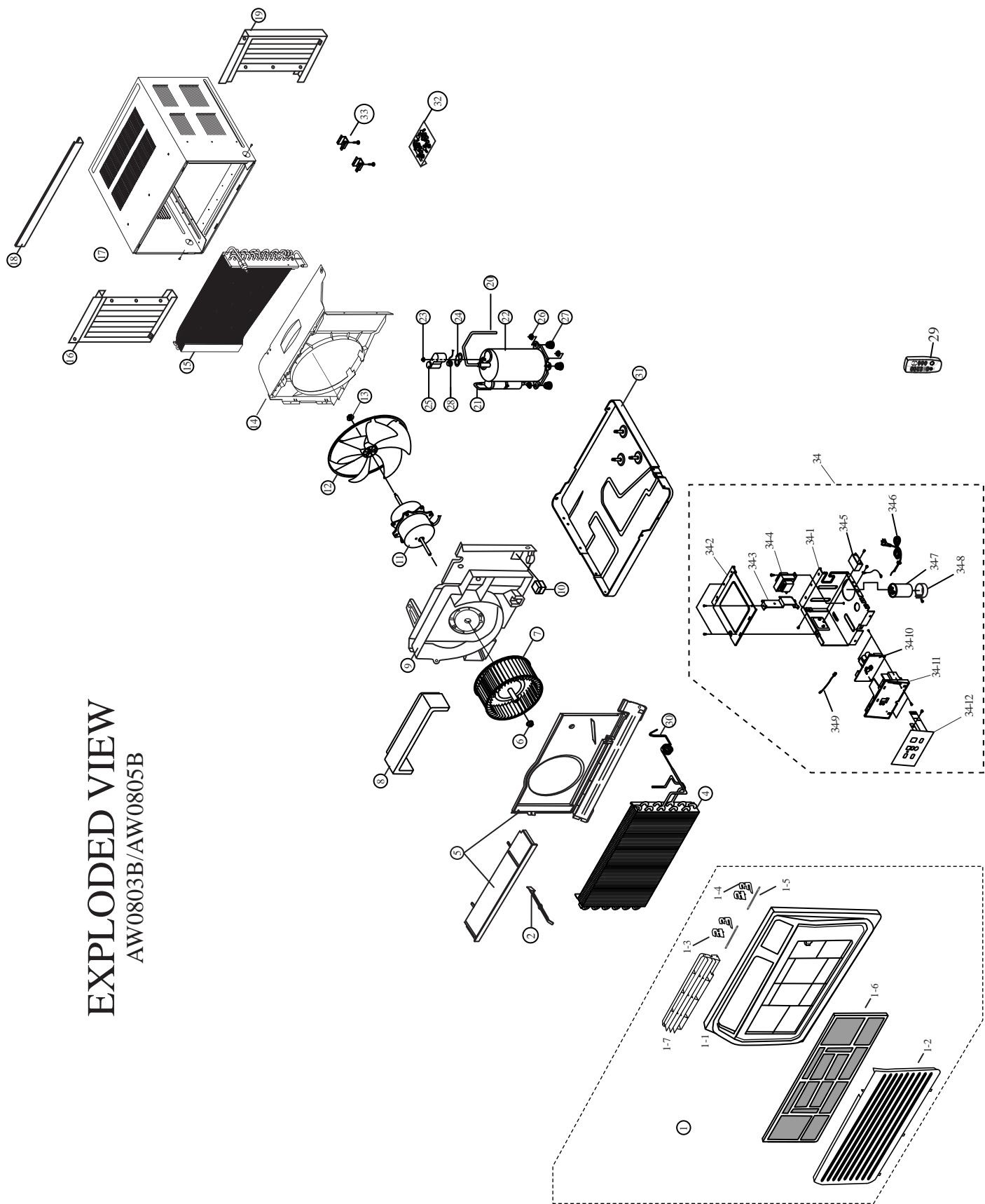
Exploded View and Parts List

■ Part List

No	Description	Code No.	Specification	Q/TY			
				AW0503B	AW0505B	AW0603B	AW0605B
1	ASSY PANEL FRONT	DB92-00516A	SEA	1	-	1	-
		DB92-00516B	SEA WALMART	-	1	-	1
1-1	PANEL FRONT	DB64-00902A	SEA-2004	1	1	1	1
1-2	GRILLE AIR INLET	DB64-00903A	SEA	1	-	1	-
		DB64-01078A	SEA WALMART	-	1	-	1
1-3	BLADE V-S	DB66-00663A	HIPS,T2.0,-,-	2	2	2	2
1-4	BLADE V-L	DB66-00546A	HIPS,T2.0,-,-	2	2	2	2
1-5	LINK BLADE	DB66-00368A	PP,L82,T1.3,-,	2	2	2	2
1-6	GUARD AIR FILTER	DB63-00806A	HIPS,T2.5,-,	1	1	1	1
2	CASE CONTROL UP	DB61-00933A	Y-PJT,SGCC-M,T0.7	1	1	1	1
4	EVAPORATOR	DB96-01972A	FP1.3,T3,2*10,W	1	1	1	1
5	ASSY-PLATE EVAP CASING	DB90-00898A	Y-PJT,ASSY	1	1	1	1
6	NUT-FRANGE	DB60-30004A	2C M6 SM20C NTR	1	1	1	1
7	BLOWER	DB67-00099A	ABS,-,OK_TOP-P/J	1	1	1	1
8	ASSY-EVAP CASE UP	DB90-00944A	Y-PJT,ASSY	1	1	1	1
9	ASSY PARTITION	DB94-00438A	Y-PJT,ASSY	1	1	1	1
10	INSULATION-TUBE	DB72-50178A	T30,W36,L34,NBR	1	1	1	1
11	MOTOR	DB31-00035K	YGN50-6K,Y-TOP(5K)	1	1	1	1
12	FAN-PROPELLER	DB67-00014A	ABS,290,6 BLADE	1	1	1	1
13	NUT-FRANGE	DB60-30020A	M6,LEFT	1	1	1	1
14	CASE COND	DB61-00932A	PP,T2,W378,L308	1	1	1	1
15	ASSY-COND	DB96-02044A	2Rx15S,FP1.5	1	1	1	1
16	ASSY SHUTTER-LF	DB92-00336A	PVC,SC-94445R	1	1	1	1
17	ASSY CABINET	DB90-01289A	Y-PJT,TOP	1	1	1	1
18	SHUTTER-ANGLE UP	DB64-00518A	SECC-P,T1,W8	1	1	1	1
19	ASSY SHUTTER-RH	DB92-00337A	PVC,SC-94445R	1	1	1	1
20	TUBE DISCHARGE	DB62-01349A	C1220T-0	-	1	1	1
		DB62-02408A	C1220T-0	1	-	-	-
21	TUBE SUCTION	DB62-01314A	C1220T-0	1	1	-	-
		DB62-01314B	C1220T-0	-	-	1	1
22	COMPRESSOR	39A050HSAKA	115V 60Hz 1Ph	-	1	-	-
		39A062HSAKA	115V 60Hz 1Ph	-	-	1	1
		DB95-00490A	2R7S126A6F	1	-	-	-
23	NUT-TERMINAL COVER	DB60-30001A	M5,-,SM20C	1	1	1	1
24	GASKET	DB63-00765A	EPDM,T0.8	1	1	1	1
25	COVER-TERMINAL	DB63-00762A	GE,-,NORYL,-,SEI-701	1	1	1	1
26	NUT WASHER	DB60-30028A	M8,ZPC	3	3	3	3
27	GROMMET-ISOLATOR	DB63-00764A	EPDM,-,BLK,OK-PJT	3	3	3	3
28	O.L.P	DB35-00022B	39A062HSAKA	-	-	1	1
		DB35-00022C	39A050HSAKA	-	1	-	-
		DB35-00031C	MAE COMP	1	-	-	-
29	ASSY CONTROL BOX	DB93-02550A	5K ELEC	1	-	-	-
		DB93-02550C	6K ELEC	-	-	1	-
		DB93-02550F	SEA-WALMART,5K	-	1	-	-
		DB93-02550G	SEA-WALMART,6K	-	-	-	1
29-1	CASE CONTROL LOW	DB61-00934A	Y-PJT,SGCC-M,T0.7,	1	1	1	1
29-2	CASE CONTROL UP	DB61-00933A	Y-PJT,SGCC-M,T0.7,W	1	1	1	1
29-3	C-OIL(COMP&FAN)	2501-001296	3.5/40UF	-	-	1	1
		2501-001290	3.5/35UF	1	1	-	-
29-4	POWER CORD	DB39-00958A	Y-TOP,ELEC.,UL,P	1	1	1	1
29-5	TRANSFORMER	DB26-00006G	AC115V,50/60HZ	1	1	1	1
29-6	ASSY MAIN PCB	DB93-02480B	Y-P/J,SSEC	1	1	1	1
29-7	PANEL CONTROL	DB64-00904A	ABS,T2.0,	1	1	1	1
29-8	SWITCH MEMBRANE	DB34-00030A	PE,-,-,40-350	1	-	1	-
		DB34-00030D	PE,-,-,40-350	-	1	-	1
29-9	CLIP CAPACITOR	DB65-00031A	SGCC-M,T0.45	1	1	1	1
29-10	THERMISTOR	DB32-10051D	10K/25,-,3425K	1	1	1	1
30	TUBE CAPILLARY	DB62-02282A	1.2x1100mm	-	-	1	1
		DB62-02153A	1.2x900mm	1	1	-	-
31	ASSY BASE	DB90-00897A	MSWR10,M8,L10	-	1	1	1
		DB90-00897C	MSWR10,M8,L10	1	-	-	-
32	ASSY-SCREW	DB97-90014K	OK-P/J	1	1	1	1
33	ASSY REMOCON	DB93-01433S	OK-PJT,ARC-735	1	1	1	1

6. Exploded View and Parts List

6-3 Main unit



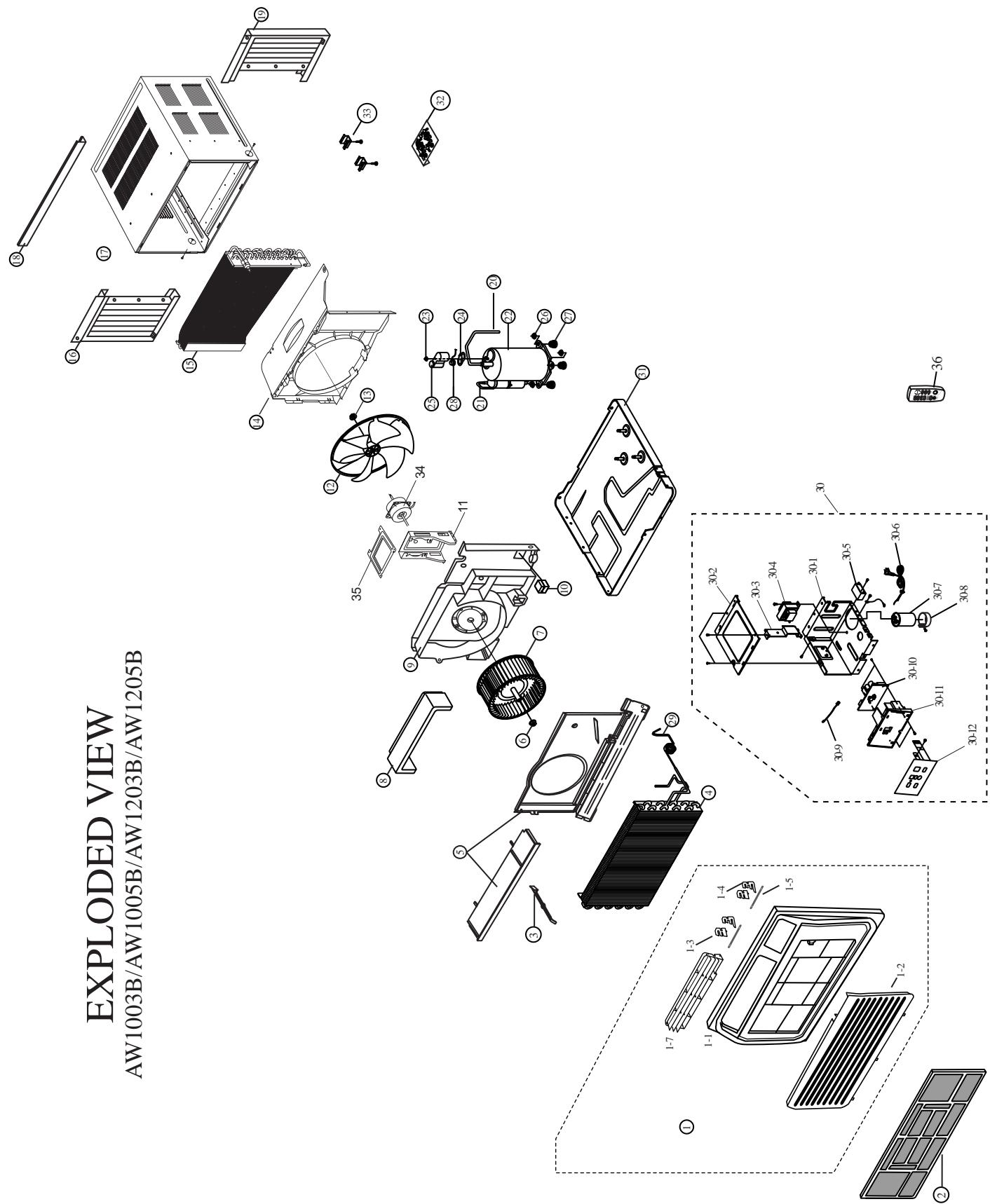
Exploded View and Parts List

■ Part List

No	Description	Code No.	Specification	Q/TY		
				AW0803B	AW0805B	REAMRK
1	ASSY PANEL FRONT	DB92-00515B	ASSY,SEA	1	-	
	ASSY PANEL FRONT	DB92-00515C	ASSY,SEA,WALMART	-	1	
1-1	PANEL FRONT	DB64-00916A	H1-P/J,HIPS,T2.0	1	1	
1-2	GRILLE AIR INLET	DB64-00917A	H1-P/J,HIPS,T2.0	1	1	
	GRILLE AIR INLET	DB64-01089A	H1-P/J,HIPS,T2.0	-	1	
1-3	BLADE V-S	DB66-00556A	H1-P/J,PP,T2.0	1	1	
1-4	BLADE V-L	DB66-00555A	H1-P/J,PP,T2.0	2	3	
1-5	LINK BLADE	DB66-00558A	H1-PJT,PP,L106.5	2	2	
1-6	GUARD AIR FILTER	DB63-00810A	H1-P/J,HIPS,T2.5	1	1	
1-7	FRAME BLADE	DB61-01530A	H1-P/J,SEA,HIPS	1	1	
2	LEVER DAMPER	DB66-00557A	H1-P/J,ABS	1	1	
4	EVAPORATOR	DB96-02987A	R2*11*FP1.2SLIT	1	1	
5	ASSY-PLATE EVAP CASING	DB90-01257A	H1-P/J,ASSY	1	1	
6	NUT-FRANGE	DB60-30004A	2C M6 SM20C NTR	1	1	
7	BLOWER	DB67-50078A	ABS,-,OK_TOP-P/J	1	1	
8	ASSY-EVAP CASE UP	DB90-01266A	H1-PJT	1	1	
9	ASSY PARTITION	DB94-00416A	H1-P/J	1	1	
10	INSULATION-TUBE	DB73-00177A	NBR-FOAM	1	1	
11	MOTOR	DB31-00215A	YSK40-6S-1,H1-PJT	1	1	
12	FAN-PROPELLER	DB67-50077A	ABS,290	1	1	
13	NUT-FRANGE	DB60-30020A	M6,-,FEFZY,LF	1	1	
14	CASE COND	DB61-01532A	H1-P/J,PP,T2.0,W448	1	1	
15	ASSY-COND	DB96-03161B	7.0-2*16,1.3	1	1	
16	ASSY SHUTTER-LF	DB92-00113C	H1-P/J,ASSY	1	1	
17	ASSY CABINET	DB90-01256A	H1-PJT	1	1	
18	SHUTTER-ANGLE UP	DB64-00048H	H1-P/J,HIPS,T3.0	1	1	
19	ASSY SHUTTER-RH	DB92-00112C	H1-P/J,ASSY	1	1	
20	TUBE DISCHARGE	DB62-02269A	C1220T-0,T0.7,OD7	1	1	
21	TUBE SUCTION	DB62-02270A	C1220T-0,T0.7,OD9.52	1	1	
22	COMPRESSOR	44A080HUAEB	1PH,115V/60Hz	1	1	
23	NUT-TERMINAL COVER	DB60-30001A	M5,-,SM20C	1	1	
24	GASKET	DB63-00765A	EPDM,0.8,-,-,65-70,	1	1	
25	COVER-TERMINAL	DB63-00762A	GE NORYL	1	1	
26	NUT WASHER	DB60-30028A	HEX 2C M8 ZPC	3	3	
27	GROMMET-ISOLATOR	DB63-00763A	44A,NR35	3	3	
28	O.L.P	DB35-00022A	44A080HUAEB	1	1	
29	ASSY REMOCON	DB93-01433S	OK-PJT,ARC-735	1	1	
34	ASSY CONTROL CASE	DB93-02487A	AW0803B	1	-	
		DB93-02487C	AW0805B	-	1	
34-1	CASE CONTROL LOW	DB61-01535A	H1-P/J,SGCC-M,T0	1	1	
34-2	CASE CONTROL UP	DB61-01536A	H1-P/J,SGCC-M,T0	1	1	
34-3	BRK CONTROL	DB61-01533A	H1-P/J,SGCC-M,T1.0,	1	1	
34-4	TRANSFORMER	DB26-00006J	~,AC115V,50/60HZ,DC	1	1	
34-5	C-OIL(FAN MOTOR)	2301-001448	8000nF,+10-5%,440V	1	1	
34-6	POWER CORD	DB39-00343D	125V,13A,-,-	1	1	
34-7	C-OIL(COMPRESSOR)	2501-001230	45uF,400V,BK	1	1	
34-8	CLIP-CAPACITOR	DB65-00031A	SGCC-M,T0.45	1	1	
34-9	THERMISTOR	DB32-10051E	10K/25,-,3435K,	1	1	
34-10	ASS'Y MAIN PCB	DB93-02478C	H,SEA	1	1	
34-11	PANEL CONTROL	DB64-00918A	H1-P/J,ABS,T2.0,W90	1	1	
34-12	SWITCH MEMBRANE	DB34-00031A	PE,SEA	1	-	
		DB34-00031D	PE,SEA##WALL	-	1	
30	TUBE CAPILLARY	DB62-02298A	1.42x1200mm	-	1	
31	ASSY BASE	DB90-01255A	H1-P/J	1	1	
32	ASSY-SCREW	DB97-30156C	SPS/GEA,	1	1	
33	BRACKET INSTALL	DB61-30219F	GE,SPS-P/J,SGCC-A	2	2	

6. Exploded View and Parts List

6-5 Main unit



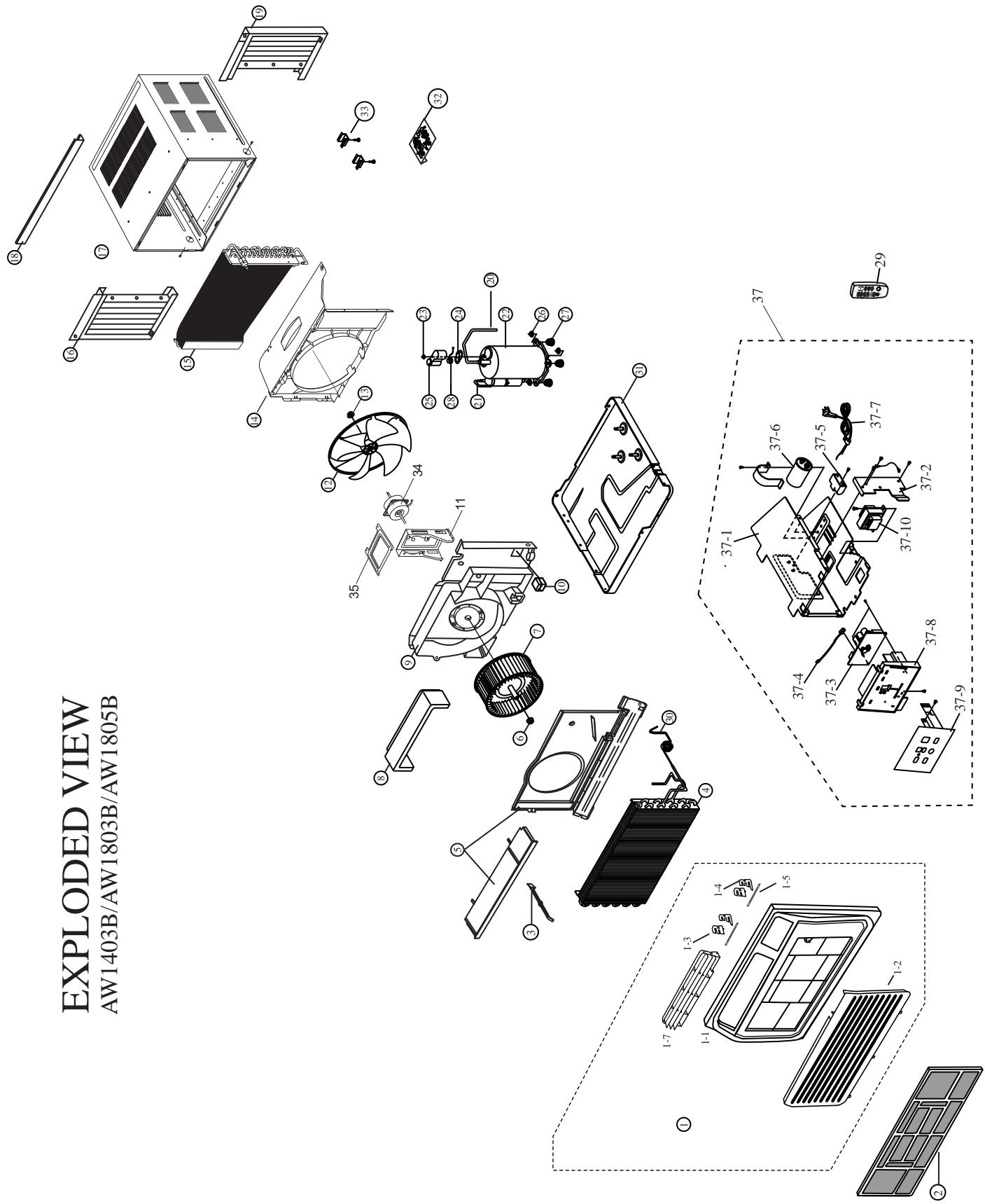
Exploded View and Parts List

■ Part List

No	Description	Code No.	Specification	Q.T.Y			
				AW1003B	AW1005B	AW1203B	AW1205B
1	ASSY PANEL FRONT	DB92-00553C	ASSY,SEA	1	-	1	-
		DB92-00553B	ASSY,SEA,WALMART	-	1	-	1
1-1	PANEL FRONT	DB64-00924A	H2-P/J,HIPS,T2.0,W393,L	1	1	1	1
1-2	GRILLE AIR INLET	DB64-00925A	H2-P/J,HIPS,T2.5	1	-	1	-
		DB64-01076A	H2-P/J,HIPS,T2.5	-	1	-	1
1-3	BLADE V-S	DB66-00561A	H2-P/J,PP,T2.0	2	2	2	2
1-4	BLADE V-L	DB66-00560A	H2-P/J,PP,T2.0,-,-	2	2	2	2
1-5	LINK BLADE	DB66-00562A	H2-PJT,TOP,PP,L106	2	2	2	2
1-7	FRAME BLADE	DB61-01538A	H2-P/J,TOP,SEA,HIPS	1	1	1	1
2	GUARD AIR FILTER	DB63-00813A	H2-P/J,HIPS,T2.5	1	1	1	1
3	LEVER DAMPER	DB66-00559A	H2-P/J,HIPS	1	1	1	1
4	EVAPORATOR	DB96-02926A	OD7*2R*12*FP1.5*470	1	1	-	-
		DB96-02939A	OD9.52*2*10*FP1.3*4	-	-	1	1
5	ASSY-PLATE EVAP CASING	DB90-01286A	H2-P/J,ASSY	1	1	1	1
6	NUT-FRANGE	DB60-30004A	M6 SM20C NTR	1	1	1	1
7	BLOWER	DB67-50073A	ABS,200	-	-	1	1
		DB67-50078A	ABS,_180	1	1	-	-
8	ASSY-EVAP CASE UP	DB90-01342A	H2-P/J,-	1	1	1	1
9	ASSY PARTITION	DB97-02047A	PP,T2.5	1	1	1	1
10	INSULATION-TUBE	DB73-00178A	H2-PJT,FOAM-PE	1	1	1	1
11	MOUNT MOTOR ASSY	DB90-01420A	H2-PJT TOP	1	1	1	1
12	FAN-PROPELLER	DB67-00139A	ABS+G.F20%,D352	1	1	1	1
13	NUT-FRANGE	DB60-30020A	M6,-,FEFZY,LF	1	1	1	1
14	CASE COND	DB61-01537A	H2-P/J,PP,T2.5	1	1	1	1
15	ASSY-COND	DB96-02940A	3R*OD7*17*FP1.5*SLIT	-	-	-	1
		DB96-02900A	2R*OD7*17*FP1.5*SL	1	1	-	-
16	ASSY SHUTTER-LF	DB92-00111A	J-P/J,ASS'Y	1	1	1	1
17	ASSY CABINET	DB90-01284A	H2-PJT,-	1	1	1	1
18	SHUTTER-ANGLE UP	DB64-00048J	-,HIPS,T3.0,-,-,SC	1	1	1	1
19	ASSY SHUTTER-RH	DB92-00110A	J-P/J,ASS'Y	1	1	1	1
20	TUBE DISCHARGE	DB62-02287A	H2-P/J,C1220T-0,TO.7	1	1	1	1
21	TUBE SUCTION	DB62-02213A	H2-P/J,C1220T-0	1	1	1	1
22	COMPRESSOR	DB95-00491A	2P16S126B1K,10K BTU	1	1	-	-
		DB95-00492A	2P18S126B1F,12K BTU	-	-	-	1
23	NUT-TERMINAL COVER	DB60-30001A	M5,-,SM20C,-	1	1	1	1
24	GASKET	DB63-00990A	MAE	1	1	1	1
25	COVER-TERMINAL	DB63-00989A	MAE	1	1	1	1
26	NUT WASHER	DB60-30028A	HEX 2C M8 ZPC	3	3	3	3
27	GROMMET-ISOLATOR	DB63-00991A	MAE	1	1	1	1
28	O.L.P	DB35-00031A	MRA98695	1	1	-	-
		DB35-00031B	MRA98896-9200	-	-	1	1
30	ASSY CONTROL BOX	DB93-02520A	SEA	1	-	1	-
		DB93-02520C	SEA WALMART	-	1	-	1
30-1	CASE CONTROL LOW	DB61-00669B	H2-PJT TOP,SGCC-M,	1	1	1	1
30-2	CASE CONTROL UP	DB61-00670A	8K TOP,SGCC-M,T0.7,	1	1	1	1
30-3	BRK CONTROL	DB61-00676A	TOP,N-PROJECT,SGCC-	1	1	1	1
30-4	TRANSFORMER	DB26-00006J	-,AC115V,50/60HZ,DC	1	1	1	1
30-5	C-OIL(FAN MOTOR)	2301-001452	15000nF,+10-5%,250V,	1	1	1	1
30-6	POWER CORD	DB39-00343E	-,-,125V,13A,AWG	1	1	1	1
30-7	C-OIL(COMPRESSOR)	2501-001230	45uF,400V,BK,53x95mm,20.6	1	1	1	1
30-8	CLIP-CAPACITOR	DB65-00031A	SGCC-M,T0.45,-,-,OK-	1	1	1	1
30-9	THERMISTOR	DB32-10051E	-,10K/25,-,3435K,-,-,-	1	1	1	1
30-10	ASS'Y MAIN PCB	DB93-02478C	H,SEA	1	1	1	1
30-11	PANEL CONTROL	DB64-00929A	H2-P/J,ABS,-,W79.8,	1	1	1	1
30-12	SWITCH MEMBRANE	DB34-00032A	-,-,PE,-,-,40-350	1	-	1	-
		DB34-00032D	-,-,PE,SEA##WALL	-	1	-	1
29	TUBE CAPILLARY	DB62-02367A	AW10**HAA,C1220T-O,-	1	1	1	1
31	ASSY BASE	DB90-01285B	H2-P/J,44 FRAME	1	1	1	1
32	ASSY-SCREW	DB97-30156C	-,-,-,-,SPS/GEA,	1	1	1	1
33	BRACKET INSTALL	DB61-30219F	GE,SPS-P/J,SGCC-A	2	2	2	2
34	MOTOR FAN	DB31-00211A	YFK-70A-6B	-	-	1	1
		DB31-00211B	YGN60-6B-2	1	1	-	-
35	PLATE REINF	DB70-00367A	H2-P/J,SGCC-M	1	1	1	1
36	REMOCON ASSY	DB93-01433S	OK-PJT,ARC-735	1	1	1	1

6. Exploded View and Parts List

6-7 Main unit



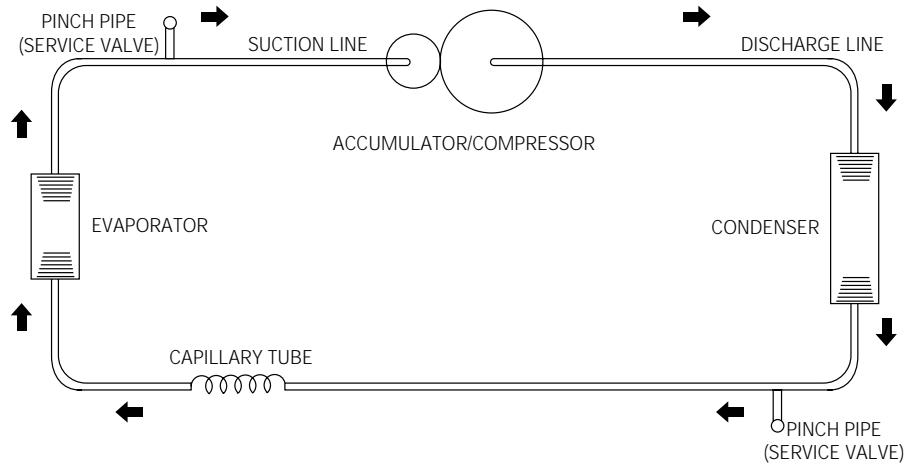
Exploded View and Parts List

■ Part List

No	Description	Code No.	Specification	Q'TY		
				AW1403B	AW1803B	AW1805B
1	ASSY PANEL FRONT	DB92-00519A	SEA,ASSY	1	1	-
		DB92-00519B	SEA,WALMART	-	-	1
1-1	PANEL FRONT	DB64-00912A	H3-P/J, TOP, SEA, HIPS	1	1	1
1-2	GRILLE AIR INLET	DB64-00913A	H3-P/J, TOP, SEA	1	1	-
		DB64-01099A	H3-P/J, TOP, SEA	-	-	1
1-3	BLADE V-S	DB66-00551A	H3-PJT,HIPS,T2.5,	1	1	1
1-4	BLADE V-L	DB66-00550A	H3-PJT,HIPS,T2.5	2	2	2
1-5	LINK BLADE	DB66-00552A	H3-PJT, TOP, PP, T1.3,	2	2	2
1-7	FRAME BLADE	DB61-01524A	H3-P/J, TOP, SEA, HIPS	1	1	1
2	GUARD AIR FILTER	DB63-00807A	H3-PJT, SEA, TOP	1	1	1
3	LEVER DAMPER	DB66-00553A	H3-P/J, TOP, SEA, ABS	1	1	1
4	EVAPORATOR	DB96-03039A	OD9.52*R3*11HOLE	1	-	-
		DB96-02969A	OD9.52*R3*11HOLE	-	1	1
5	ASSY-PLATE EVAP CASING	DB90-01288A	H3-P/J,ASSY	1	1	1
6	NUT-FRANGE	6021-001056	HEX-PLANGE,M8XP1	1	1	1
7	BLOWER	DB67-00096A	ABS+G/F20%,M-P/J	1	1	1
8	CASE EVAP UP	DB61-01528A	H3-P/J, TOP, 25F0AM-PS	1	1	1
9	ASSY PARTITION	DB97-02027A	PP,T2.5,-,-,BLK,-,	1	1	1
10	INSULATION-TUBE	DB73-00173A	H3-PJT, TOP, NRB	-	1	1
		DB73-00173B	AW1403B, TOP, NRB	1	-	-
11	MOUNT MOTOR	DB61-01496A	H3-P/J,SGCC-M	-	1	1
		DB61-01512A	H3-P/J,SGCC-M	1	-	-
12	FAN-PROPELLER	DB67-00047B	ABS,OD390,-,-,M-P/J	1	1	1
13	NUT-FRANGE	DB60-30028A	HEX 2C M8 ZPC	1	1	4
14	CASE COND	DB61-01495A	H3-P/J,PP,T2.5	1	1	1
15	ASSY-COND	DB96-02699B	H3-P/J,-	-	1	1
		DB96-02699C	H3-P/J,AW1403B	1	-	-
16	ASSY SHUTTER-LF	DB92-00109A	M-P/J,ASS'Y	1	1	1
17	ASSY CABINET	DB90-01217B	AW1803B/XAA,H3-PJT	1	1	1
18	SHUTTER-ANGLE UP	DB64-01020A	-,HIPS,T3.0,W41,L6	1	1	1
19	ASSY SHUTTER-RH	DB92-00108A	M-P/J,ASS'Y	1	1	1
20	TUBE DISCHARGE	DB62-02469A	AW1403M/XAA,C1220T	1	-	-
		DB62-02593A	H3-P/J,C1220T-0,TO.7	-	1	1
21	TUBE SUCTION	DB62-02470A	AW1403M/XAA,C1220T	1	-	-
		DB62-02234A	H3-P/J,C1220T-0,TO.8	-	1	1
22	COMPRESSOR	44B135HX1EL	1PH,115V/60Hz	1	-	-
		48D180IU1EQ	1PH,208-230V/60Hz	-	1	1
23	NUT-TERMINAL COVER	DB60-30001A	M5,-,SM20C	1	1	1
24	GASKET	DB63-20003A	EPDM,T0.8	1	1	1
25	COVER-TERMINAL	DB63-10026A	GE,-,NORYL	1	1	1
26	NUT WASHER	DB60-30028A	HEX 2C M8 ZPC	3	3	3
27	GROMMET-ISOLATOR	DB73-10001A	EPDM	3	3	3
28	O.L.P	DB47-20001U	MRA98693-12007	1	-	-
		DB35-00011C	MRA12046-12007	-	1	1
37	ASSY CONTROL BOX	DB93-02510A	AW1803B/XAA	-	1	-
		DB93-02510B	AW1403B/XAA	1	-	-
		DB93-02510C	AW1805B/XAA	-	-	1
37-1	CASE CONTROL	DB61-01527A	H3-P/J, TOP, SGCC-M, T0.7	1	1	1
37-2	BRACKET-CONTROL	DB61-01526A	H3-P/J, TOP, SGCC-M, T	1	1	1
37-3	ASSY MAIN PCB	DB93-02478C	H,SEA	1	1	1
37-4	THERMISTOR	DB32-10051E	-,10K/25,-,3435K,-,-,-	1	1	1
37-5	CAPACITOR(6mfd)	2301-001449	6000nF,+10-5%,440V,B	-	1	1
		2301-001452	15uF	1	-	-
37-6	CAPACITOR(35mfd)	2501-001237	35uF,450V	-	1	1
		2501-001231	50uF	1	-	-
37-7	POWER-CORD	DB39-00344B	250V,13A,AWG	-	1	1
		DB39-00343F	250V,15A,AWG	1	-	-
37-8	PANEL-CONTROL	DB64-00911A	H3-P/J, TOP, SEA, ELEC	1	1	1
37-9	MEMBRANE PAD	DB34-00033A	-,-,PE,-,-,40-350	1	1	-
		DB34-00033D	SEA WALMART	-	-	1
37-10	TRANSFORMER	DB26-00006K	AC230V,50/60HZ,DC	-	1	1
		DB26-00006J	AC115V,50/60HZ,DC	1	-	-
30	TUBE CAPILLARY	DB96-02970A	ID1.3x1200x3EA	-	1	1
		DB96-03150A	ID1.42x1400x2EA	1	-	-
31	ASSY BASE	DB90-01215B	H3-PJT	-	1	1
		DB90-01215C	H3-PJT, FOR 44 COMP	1	-	-
32	ASSY-SCREW	DB97-90014U	M-P/J,(XAX)	1	1	1
33	BRACKET INSTALL	DB61-30219F	GE,SPS-P/J,SGCC-A,T	2	2	2
34	MOTOR FAN	DB31-00214C	YSK160-6A-3,18K-C TOP	-	1	1
		DB31-00236A	YGN59-6B	1	-	-
35	PLATE REINF	DB70-00342A	H3-P/J,SGCC-M,-,T0.8	1	1	1
29	REMOCON ASSY	DB93-01433S	SEA	1	1	1

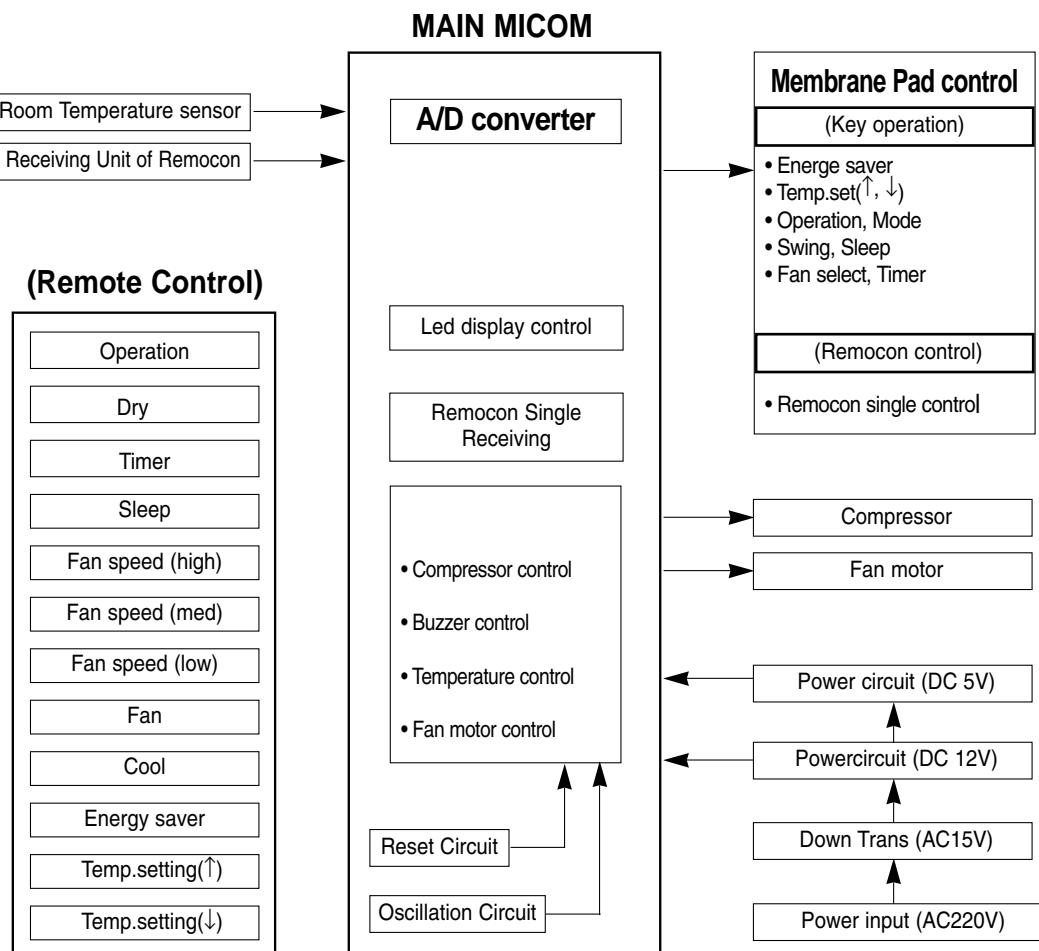
7. Block Diagram

7-1 Refrigerating Cycle Block Diagram



7-2 Basic Structure

7-2-1 Micom Control Diagram



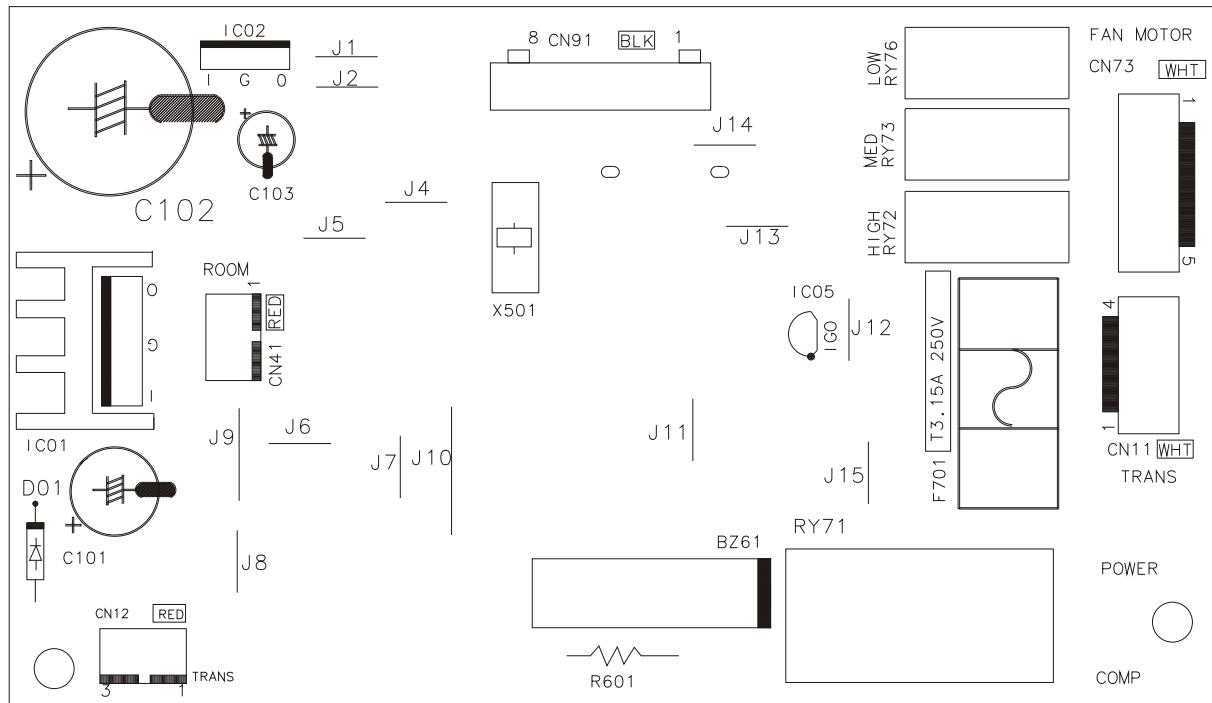
7-2-2 Micom pin assignment

KS88C4716				
SEG-DATA(c)	1	P0.1	P4.4	44 GRID5
SEG-DATA(b)	2	P0.0	P0.2	43 SEG-DATA(d)
GRID4	3	P4.3	P0.3	42 SEG-DATA(e)
GRID3	4	P4.2	P0.4	41 SEG-DATA(f)
Vcc	5	VDD	P0.5	40 SEG-DATA(g)
Vss	6	VSS	P0.6	39 SEG-DATA(h)
10MHz RESONATOR	7	Xout	P0.7	38 SEG-DATA(a)
10MHz RESONATOR	8	Xin	P1.0	37 EEPROM CLK
TEST	9	TEST	P1.1	36 EEPROM IN
GRID2	10	P4.1	P1.2	35 EEPROM OUT
GRDI1	11	P4.0	P1.3	34 BUZZER
RESET IC OUTPUT	12	RESET	P1.4	33 OPTION
KEY-IN1	13	P2.0	P1.5	32 JIG OUTPUT
KEY-IN2	14	P2.1	P3.7	31 OPTION
REMOCON	15	P2.2	P3.6	30 SENSOR THERMIS-
EEPROM CS	16	P2.3	P3.5	29 TOR(103AT)
LOW FAN	17	P2.4	P3.4	28 OPTION
COMPRESSOR	18	P2.5	P3.3	27 OPTION
MIDDLE FAN	19	P2.6	P3.2	26 OPTION
HIGH FAN	20	P2.7	P3.1	25 OPTION
4-WAY VALVE	21	P4.5	P3.0	24 SAVE OPTION
Vcc	22	AVref	AVss	23 SWING MOTOR GND

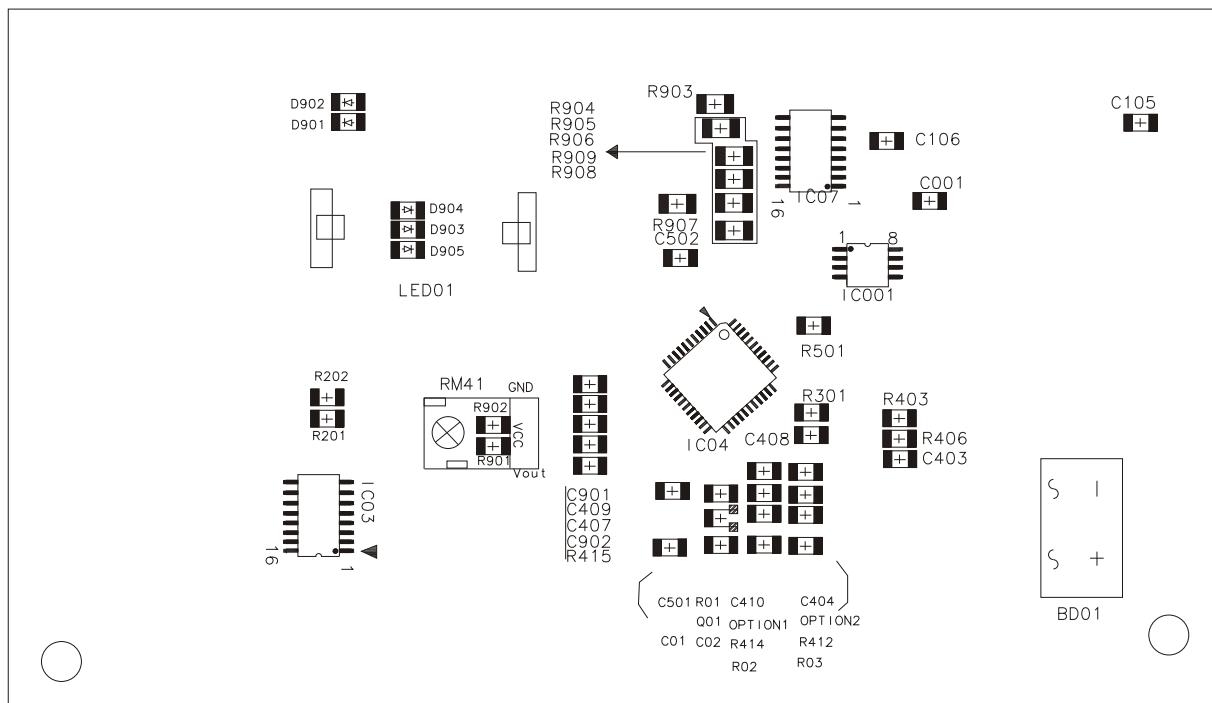
8. PCB Diagram

ASSY MAIN PCB:DB93-02480

FRONT SIDE



BACK SIDE



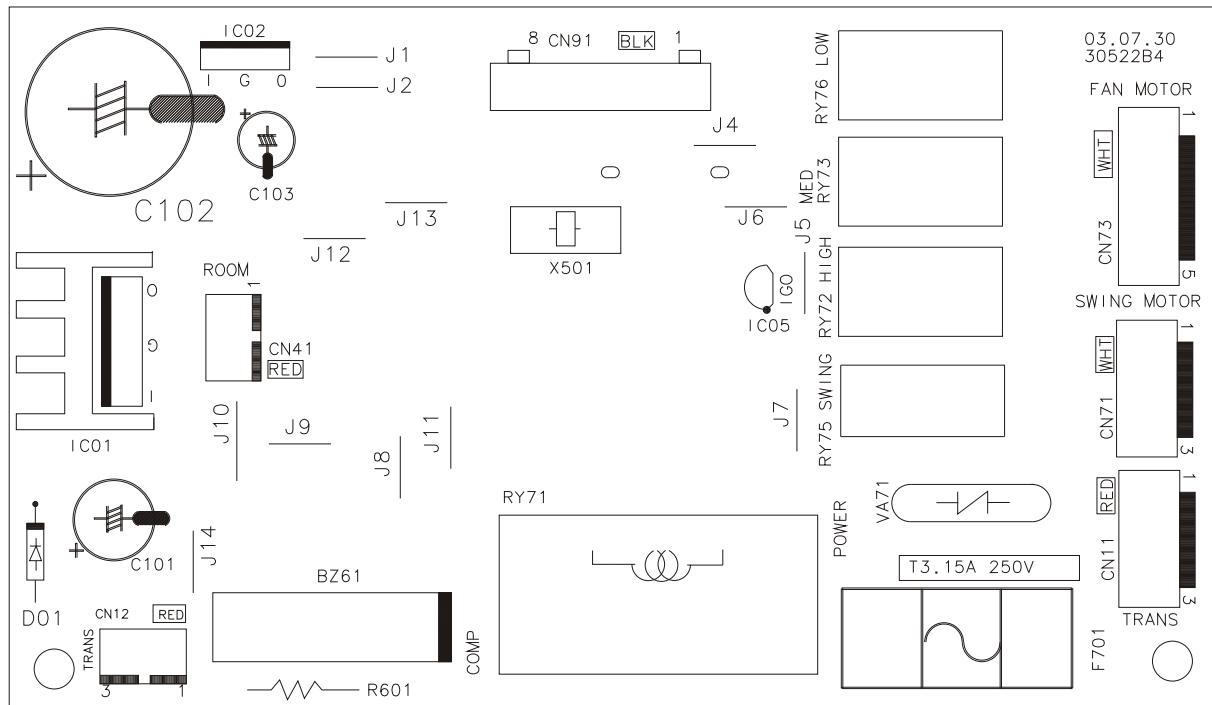
PART LIST
ASSY MAIN PCB: DB93-02480B

NO.	DESCRIPTION	SPEC	REMARK	Q'TY	INSTALL
1	IC	ULN2003AD	IC03,IC07	2	SMT
2	DIODE-BRIDGE(CHIP)	DF06S	BD01	1	SMT
3	DIODE-SWITCHING(CHIP)	LL4148	D901----D905	5	SMT
4	DIODE	UF4002 100V/1A	D01	1	MI
5	TRI-DIODE-CHIP	2SC2412K	Q01	1	SMT
6	REGULATOR	KA7805	IC02	1	MI
7	REGULATOR	KA7812	IC01	1	MI
8	C-AL	CD110X,10V,100uF	C103	1	AI
9	C-AL	CD110X,35V,1000uF	C101	1	MI
10	C-AL	CD110X,25V,2200uF	C102	1	MI
11	C-CHIP	101K,2012,50V	C407	1	SMT
12	C-CHIP	102K,2012,50V	C408,C409,C902	3	SMT
13	C-CHIP	104Z,2012,50V	C105,C106,C01,C02,C403,C404,C410	7	SMT
14	C-CHIP	223Z,2012,50V	C901,C501,C502,C001	4	SMT
15	R-CHIP	6.8K,2012,1%,1/8W	R403	1	SMT
16	R-CHIP	1K,2012,5%,1/10W	,R201,R202	2	SMT
17	R-CHIP	10K,2012,5%,1/10W	R03,R501,R412,R901,R301	5	SMT
18	R-CHIP	10K,2012,1%,1/10W	R414	1	SMT
19	R-CHIP	330,2012,5%,1/10W	R902,R415,R406	3	SMT
20	R-CHIP	2.2K,1/10W,5%,2012	R01	1	SMT
21	R-CHIP	3.3K,1/10W,5%,2012	R02	1	SMT
22	R-CHIP	4.7K,1/10W,5%, 2012	OPTION2	1	SMT
23	R-CHIP	28.7K,1%,1/10W,2012	OPTION1	1	SMT
24	R-CHIP	120,5%,1/4W,1206	R903,R904,R905,R906,R907,R908,R909	7	SMT
25	R-CARBON	620,1/2W(SMALL),5%	R601	1	AI
26	BUZZER	SP-D2220APP	BZ61	1	MI
27	CERAMIC RESONATOR	10MHz	X501	1	MI
28	HEAT SINK	L15 W15 H25		1	MI
29	CONNECTOR	SMW250-02(RED)	CN41	1	MI
30	CONNECTOR	SMW250-03(RED)	CN12	1	MI
31	CONNECTOR	FCZ254-08S(BLK)	CN91	1	MI
32	CONNECTOR	VH-4A(WHT)	CN11	1	MI
33	CONNECTOR	VH-5A (WHT)	CN73	1	MI
34	FUSE	250V,T3.15A	F701	1	MI
35	RELAY-POWER	DU1PU,16A,250V	RY71	1	MI
36	RELAY-POWER	F3AA012E	RY72,RY73,RY76	3	MI
37	SCREW TAPPING	PH3 L8		1	MI
38	JUMP WIRE	PH0.6,L7.5mm	J1, J2,J4--J8,J11--J15	12	AI
39	JUMP WIRE	PH0.6,L10mm	J9	1	AI
40	JUMP WIRE	PH0.6,L12.5mm	J10	1	AI
41	PCB-MAIN	5KFR-1,63*113*1.6MM	30522A4	1	
42	IC	KA75330Z	IC05	1	AI
43	CHIP-MCU	KS88C4716	IC04	1	SMT
44	LED DISPLAY	CSE-42202G	LED01	1	MI
45	REMOCON	FRP-4021H10	RM41	1	MI
46	FUSE HOLDER	HF-004/J	F701	2	MI

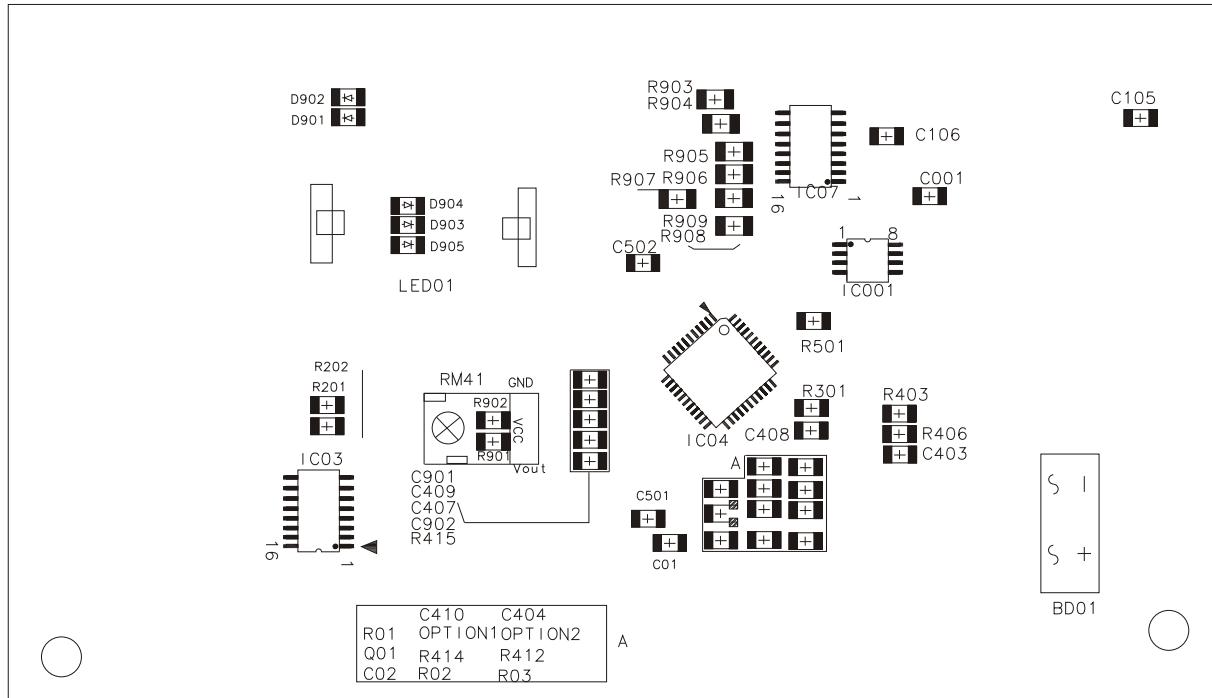
8. PCB Diagram

ASSY MAIN PCB:DB93-02478

FRONT SIDE



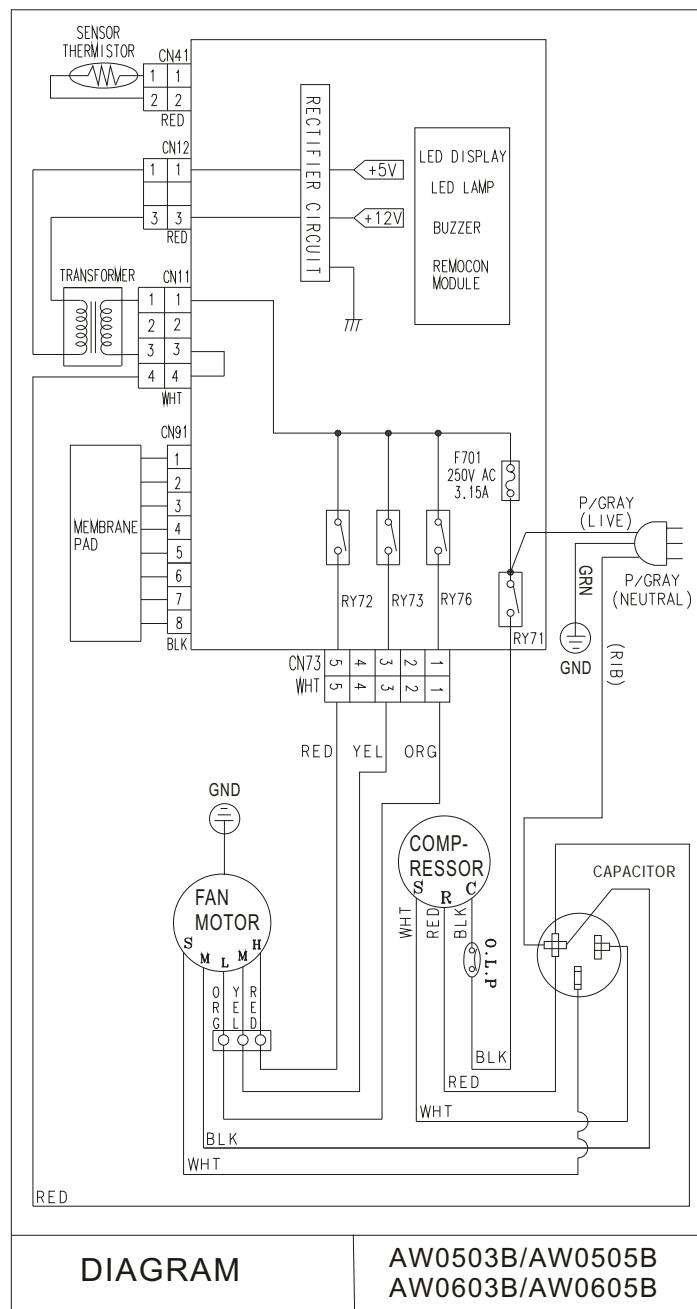
BACK SIDE



PART LIST**ASSY MAIN PCB: DB93-02478C**

NO.	DESCRIPTION	SPEC	REMARK	Q'TY	INSTALL
1	IC	ULN2003AD	IC03,IC07	2	SMT
2	DIODE-BRIDGE(CHIP)	DF06S	BD01	1	SMT
3	DIODE-SWITCHING(CHIP)	LL4148	D901----D905	5	SMT
4	DIODE	UF4002 100V/1A	D01	1	MI
5	TRI-DIODE-CHIP	2SC2412K	Q01	1	SMT
6	REGULATOR	KA7805	IC02	1	MI
7	REGULATOR	KA7812	IC01	1	MI
8	C-AL	CD110X,10V,100uF	C103	1	AI
9	C-AL	CD110X,35V,1000uF	C101	1	MI
10	C-AL	CD110X,25V,2200uF	C102	1	MI
11	C-CHIP	101K,2012,50V	C407	1	SMT
12	C-CHIP	102K,2012,50V	C408,C409,C902	3	SMT
13	C-CHIP	104Z,2012,50V	C105,C106,C01,C02,C403,C404,C410	7	SMT
14	C-CHIP	223Z,2012,50V	C901,C501,C502,C001	4	SMT
15	R-CHIP	6.8K,2012,1%,1/8W	R403	1	SMT
16	R-CHIP	1K,2012,5%,1/10W	R201,R202	2	SMT
17	R-CHIP	10K,2012,5%,1/10W	R03,R501,R412,R901,R301,	5	SMT
18	R-CHIP	10K,2012,1%,1/10W	R414	1	SMT
19	R-CHIP	330,2012,5%,1/10W	R902,R415,R406	3	SMT
20	R-CHIP	2.2K,1/10W,5%,2012	R01	1	SMT
21	R-CHIP	3.3K,1/10W,5%,2012	R02	1	SMT
22	R-CHIP	4.7K,1/10W,5%,2012	OPTION2	1	SMT
23	R-CHIP	28.7K,1%,1/10W,2012	OPTION1	1	SMT
24	R-CHIP	120,5%,1/4W,1206	R903,R904,R905,R906,R907,R908,R909	7	SMT
25	R-CARBON	620,1/2W(SMALL),5%	R601	1	AI
26	BUZZER	SP-D2220APP	BZ61	1	MI
27	CERAMIC RESONATOR	10MHz	X501	1	MI
28	HEAT SINK	L15 W15 H25		1	MI
29	CONNECTOR	SMW250-02(RED)	CN41	1	MI
30	CONNECTOR	SMW250-03(RED)	CN12	1	MI
31	CONNECTOR	FCZ254-08S(BLK)	CN91	1	MI
32	CONNECTOR	VH-3A(RED)	CN11	1	MI
33	CONNECTOR	VH-5A (WHT)	CN73	1	MI
34	FUSE	250V,T3.15A	F701	1	MI
35	RELAY-POWER	DI1U 12VDC	RY71	1	MI
36	RELAY-POWER	OJ-SS-112DM (5A)	RY72,RY73,RY76	3	MI
37	SCREW TAPPING	PH3 L8		1	MI
38	JUMP WIRE	PH0.6,L7.5mm	J1, J2,J4--J9,J11--J14	12	AI
39	JUMP WIRE	PH0.6,L10mm	J10	1	AI
40	PCB-MAIN	FR-1,63*113*1.6MM	30522B4	1	MI
41	IC	KA75330Z	IC05	1	AI
42	CHIP-MCU	KS88C4716	IC04	1	SMT
43	LED DISPLAY	CSE-42202G	LED01	1	MI
44	REMOCON	FRP-4021H10	RM41	1	MI
45	FUSE HOLDER	HF-004/J	F701	2	MI

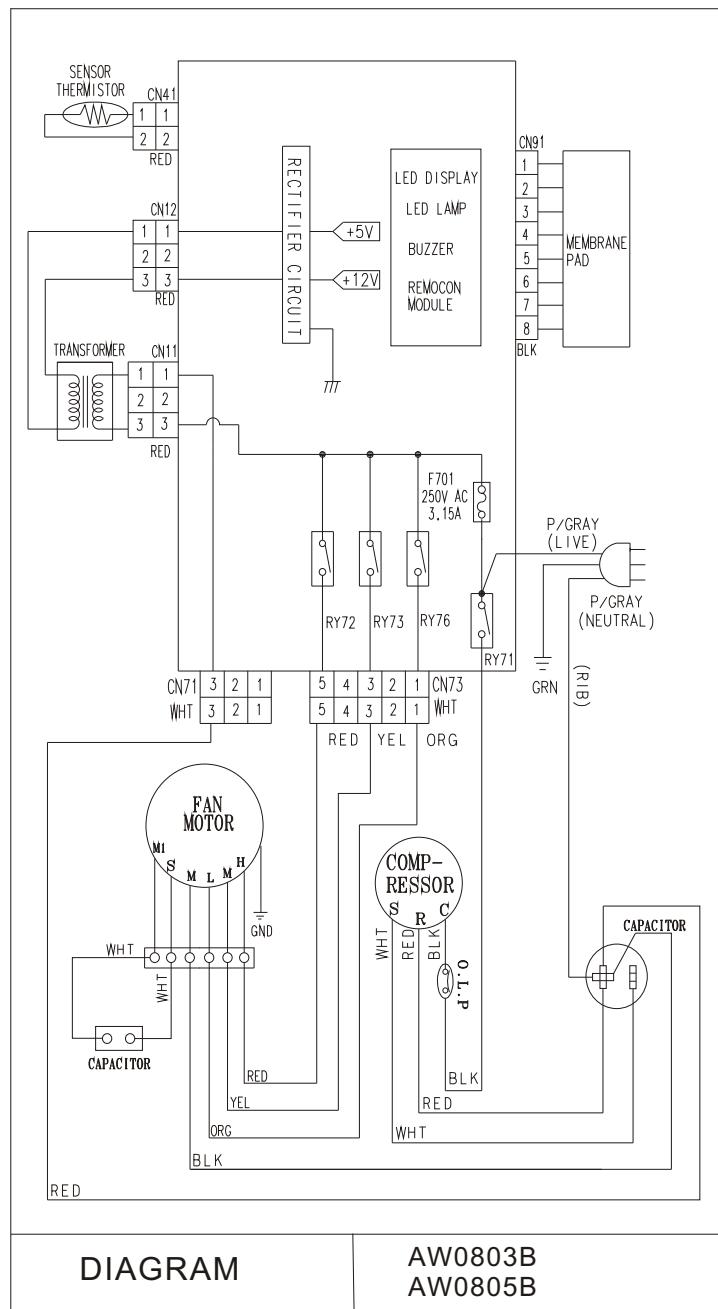
9. Wiring Diagram



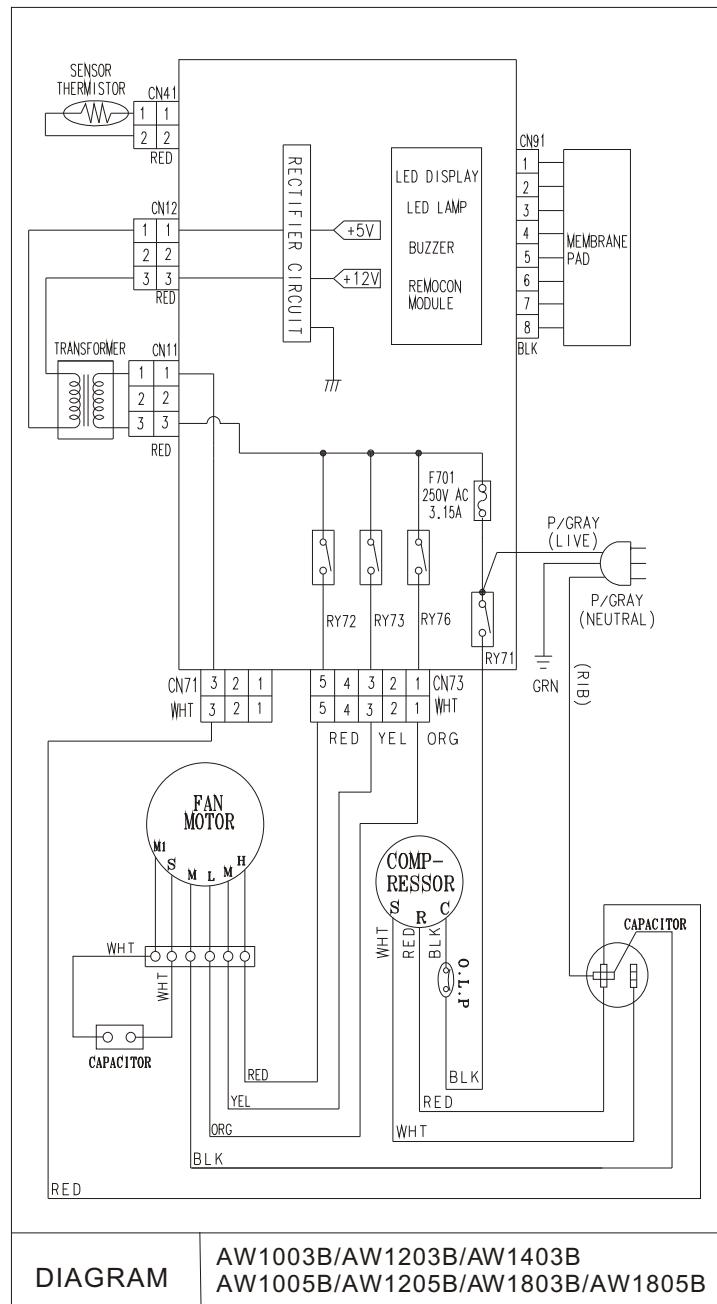
DIAGRAM

AW0503B/AW0505B
AW0603B/AW0605B

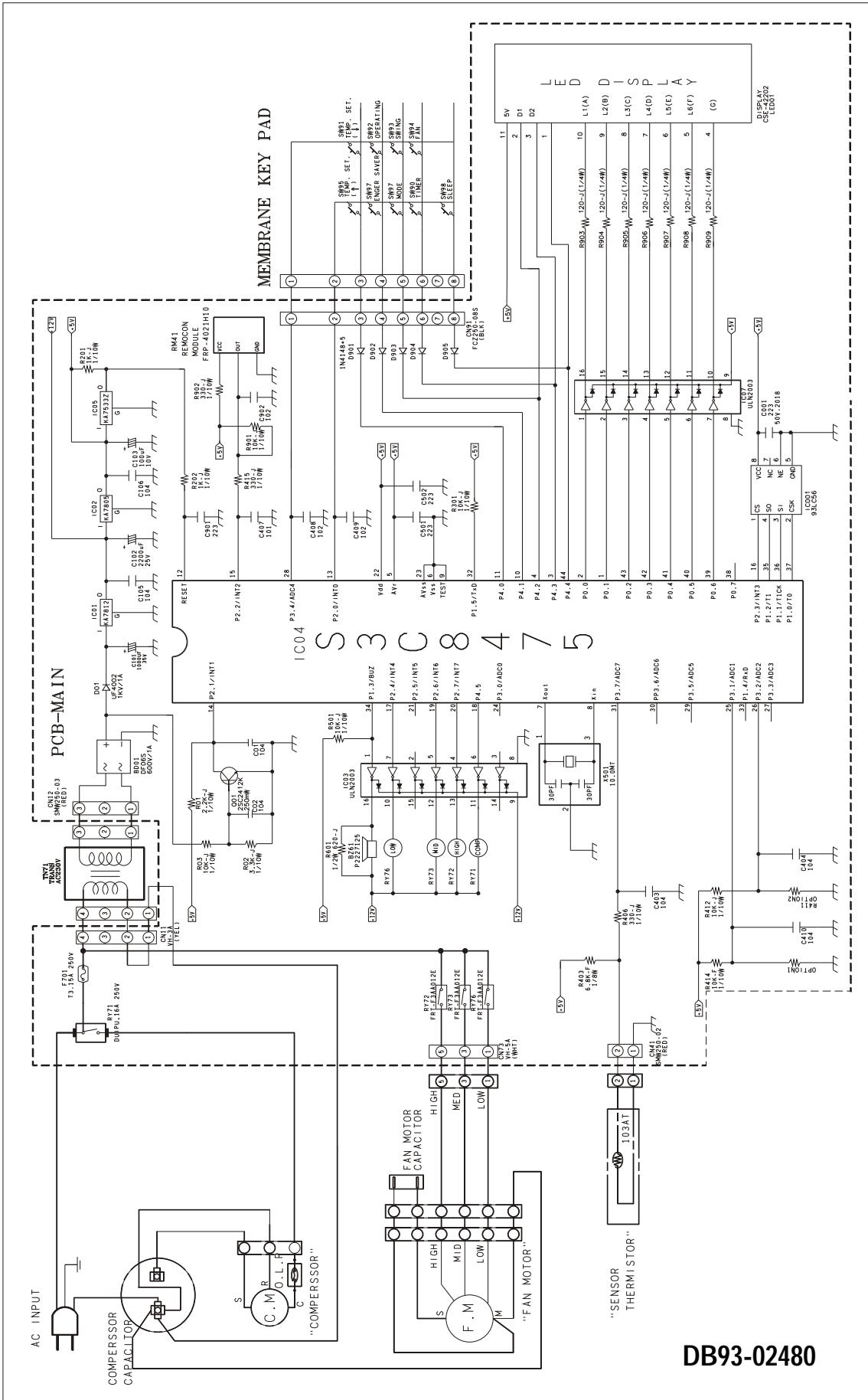
9. Wiring Diagram



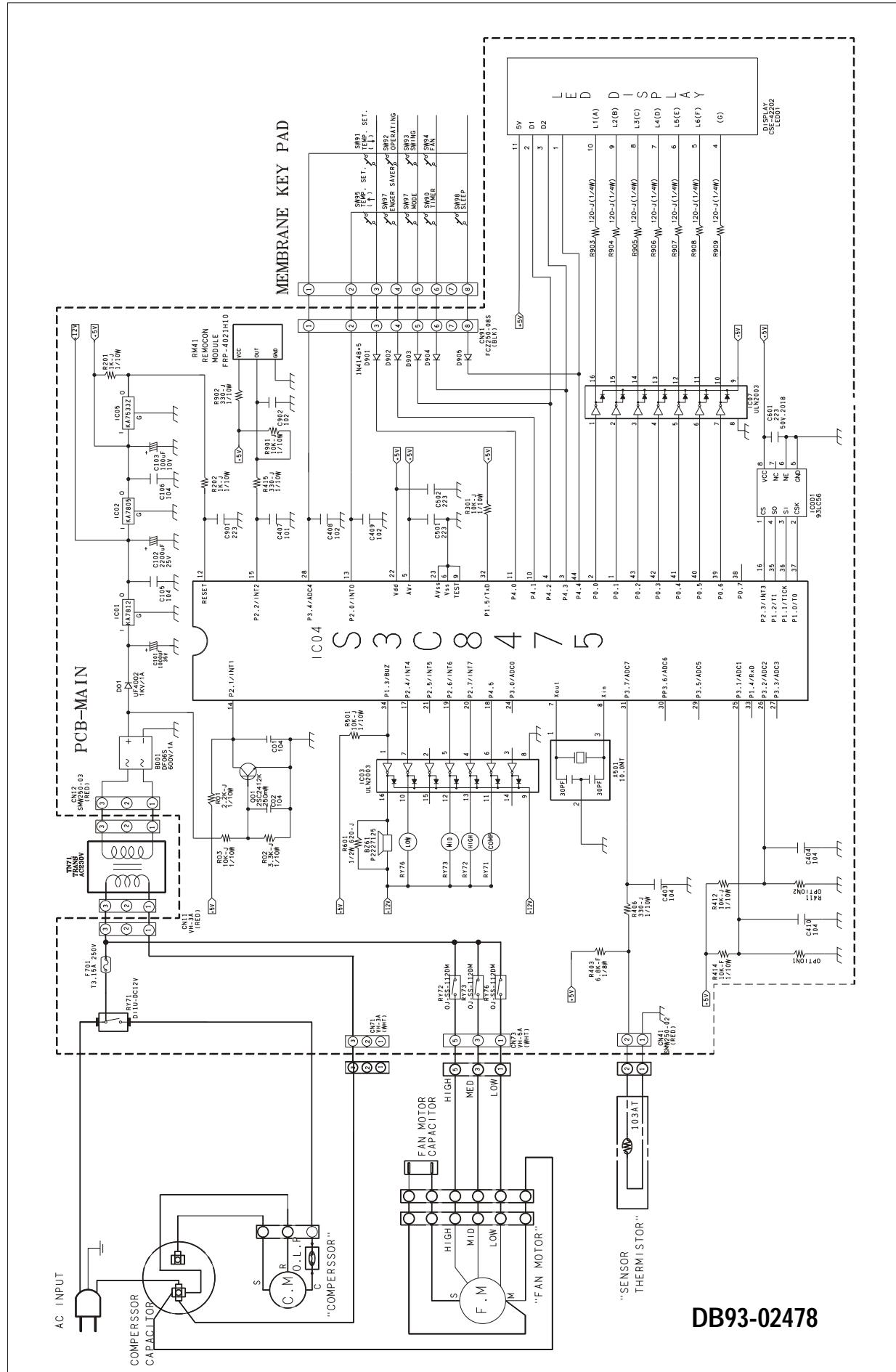
9. Wiring Diagram



10. Schematic Diagrams



10. Schematic Diagrams



DB93-02478

UPDATE LOG SHEET

Use this page to keep any special servicing information. (Service Bulletin, etc.)

If only parts number changes, Just change parts number directly on parts list.

And if you need more information, please see the service website.

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